

Genetic Screens in Human Cells Using the CRISPR-Cas9

Science

343, 80-84

DOI: [10.1126/science.1246981](https://doi.org/10.1126/science.1246981)

Citation Report

#	ARTICLE	IF	CITATIONS
1	Progress in genomics according to bingo: 2013 edition. <i>Genome Biology</i> , 2013, 14, 143.	13.9	1
2	sgRNAcas9: A Software Package for Designing CRISPR sgRNA and Evaluating Potential Off-Target Cleavage Sites. <i>PLoS ONE</i> , 2014, 9, e100448.	1.1	327
3	CRISPR/Cas9-Mediated Gene Knock-Down in Post-Mitotic Neurons. <i>PLoS ONE</i> , 2014, 9, e105584.	1.1	84
4	CRISPRseek: A Bioconductor Package to Identify Target-Specific Guide RNAs for CRISPR-Cas9 Genome-Editing Systems. <i>PLoS ONE</i> , 2014, 9, e108424.	1.1	169
5	Concerning RNA-guided gene drives for the alteration of wild populations. <i>ELife</i> , 2014, 3, .	2.8	653
6	Tipping Points in Seaweed Genetic Engineering: Scaling Up Opportunities in the Next Decade. <i>Marine Drugs</i> , 2014, 12, 3025-3045.	2.2	21
7	edgeR: a versatile tool for the analysis of shRNA-seq and CRISPR-Cas9 genetic screens. <i>F1000Research</i> , 2014, 3, 95.	0.8	80
9	Novel methods and approaches to acute lymphoblastic leukemia drug discovery. <i>Expert Opinion on Drug Discovery</i> , 2014, 9, 1435-1446.	2.5	8
10	Approaches for establishing the function of regulatory genetic variants involved in disease. <i>Genome Medicine</i> , 2014, 6, 92.	3.6	34
11	Haploid animal cells. <i>Development (Cambridge)</i> , 2014, 141, 1423-1426.	1.2	29
12	MAGeCK enables robust identification of essential genes from genome-scale CRISPR/Cas9 knockout screens. <i>Genome Biology</i> , 2014, 15, 554.	3.8	1,614
13	Screening CRISPLY in human cells. <i>Nature Methods</i> , 2014, 11, 125-125.	9.0	2
14	Targeting Hepatitis B Virus With CRISPR/Cas9. <i>Molecular Therapy - Nucleic Acids</i> , 2014, 3, e216.	2.3	240
15	Hunting the Needle in the Haystack: A Guide to Obtain Biologically Meaningful MicroRNA Targets. <i>International Journal of Molecular Sciences</i> , 2014, 15, 20266-20289.	1.8	21
16	Bacterial Cellular Engineering by Genome Editing and Gene Silencing. <i>International Journal of Molecular Sciences</i> , 2014, 15, 2773-2793.	1.8	42
17	Functional toxicology: tools to advance the future of toxicity testing. <i>Frontiers in Genetics</i> , 2014, 5, 110.	1.1	32
18	Next-Generation Models of Human Cardiogenesis via Genome Editing. <i>Cold Spring Harbor Perspectives in Medicine</i> , 2014, 4, a013920-a013920.	2.9	4
19	Efficient Gene Disruption in Diverse Strains of <i>Toxoplasma gondii</i> Using CRISPR/CAS9. <i>MBio</i> , 2014, 5, e01114-14.	1.8	407

#	ARTICLE	IF	CITATIONS
20	Understanding functional miRNA–target interactions in vivo by site-specific genome engineering. <i>Nature Communications</i> , 2014, 5, 4640.	5.8	86
21	Haploid Mouse Embryonic Stem Cells: Rapid Genetic Screening and Germline Transmission. <i>Annual Review of Cell and Developmental Biology</i> , 2014, 30, 705-722.	4.0	32
22	Measuring error rates in genomic perturbation screens: gold standards for human functional genomics. <i>Molecular Systems Biology</i> , 2014, 10, 733.	3.2	322
23	Targeted mutagenesis using CRISPR/Cas system in medaka. <i>Biology Open</i> , 2014, 3, 362-371.	0.6	197
24	Comparison of TALE designer transcription factors and the CRISPR/dCas9 in regulation of gene expression by targeting enhancers. <i>Nucleic Acids Research</i> , 2014, 42, e155-e155.	6.5	173
25	TALEN and CRISPR/Cas9-mediated genome editing in the early-branching metazoan <i>Nematostella vectensis</i> . <i>Nature Communications</i> , 2014, 5, 5486.	5.8	137
26	The new frontier of genome engineering with CRISPR-Cas9. <i>Science</i> , 2014, 346, 1258096.	6.0	4,828
27	Genome-wide mapping of cellular traits using yeast. <i>Yeast</i> , 2014, 31, 197-205.	0.8	17
28	Cas9-Based Genome Editing in Zebrafish. <i>Methods in Enzymology</i> , 2014, 546, 377-413.	0.4	41
29	Enhanced Specificity and Efficiency of the CRISPR/Cas9 System with Optimized sgRNA Parameters in <i>Drosophila</i> . <i>Cell Reports</i> , 2014, 9, 1151-1162.	2.9	284
30	Determining the Specificities of TALENs, Cas9, and Other Genome-Editing Enzymes. <i>Methods in Enzymology</i> , 2014, 546, 47-78.	0.4	59
31	Targeted Genome Editing in Human Cells Using CRISPR/Cas Nucleases and Truncated Guide RNAs. <i>Methods in Enzymology</i> , 2014, 546, 21-45.	0.4	43
32	In vivo shRNA screens in solid tumors. <i>Nature Protocols</i> , 2014, 9, 2880-2902.	5.5	38
33	Adapting CRISPR/Cas9 for Functional Genomics Screens. <i>Methods in Enzymology</i> , 2014, 546, 193-213.	0.4	17
35	A Co-CRISPR Strategy for Efficient Genome Editing in <i>Caenorhabditis elegans</i> . <i>Genetics</i> , 2014, 197, 1069-1080.	1.2	282
36	Multi-input CRISPR-Cas genetic circuits that interface host regulatory networks. <i>Molecular Systems Biology</i> , 2014, 10, 763.	3.2	213
37	Genetic interaction analysis of point mutations enables interrogation of gene function at a residue-level resolution. <i>BioEssays</i> , 2014, 36, 706-713.	1.2	9
38	Can genome engineering be used to target cancer-associated enhancers?. <i>Epigenomics</i> , 2014, 6, 493-501.	1.0	7

#	ARTICLE	IF	CITATIONS
39	Strategies for gene disruption in Drosophila. <i>Cell and Bioscience</i> , 2014, 4, 63.	2.1	20
40	RNA interference screening to detect targetable molecules in hematopoietic stem cells. <i>Current Opinion in Hematology</i> , 2014, 21, 283-288.	1.2	5
41	Generation of Genomic Deletions in Mammalian Cell Lines via CRISPR/Cas9. <i>Journal of Visualized Experiments</i> , 2015, , e52118.	0.2	123
42	Easy quantitative assessment of genome editing by sequence trace decomposition. <i>Nucleic Acids Research</i> , 2014, 42, e168-e168.	6.5	1,838
43	Plant genome engineering in full bloom. <i>Trends in Plant Science</i> , 2014, 19, 284-287.	4.3	83
44	Crystal Structure of Cas9 in Complex with Guide RNA and Target DNA. <i>Cell</i> , 2014, 156, 935-949.	13.5	1,690
45	Genome Engineering with Targetable Nucleases. <i>Annual Review of Biochemistry</i> , 2014, 83, 409-439.	5.0	472
46	Gene editing at CRISPR speed. <i>Nature Biotechnology</i> , 2014, 32, 309-312.	9.4	37
47	High-throughput screening of a CRISPR/Cas9 library for functional genomics in human cells. <i>Nature</i> , 2014, 509, 487-491.	13.7	648
48	Engineering the <i>Caenorhabditis elegans</i> genome with CRISPR/Cas9. <i>Methods</i> , 2014, 68, 381-388.	1.9	49
49	CRISPR-based technologies: prokaryotic defense weapons repurposed. <i>Trends in Genetics</i> , 2014, 30, 111-118.	2.9	92
50	CRISPR-Cas systems for editing, regulating and targeting genomes. <i>Nature Biotechnology</i> , 2014, 32, 347-355.	9.4	2,648
51	A guide to genome engineering with programmable nucleases. <i>Nature Reviews Genetics</i> , 2014, 15, 321-334.	7.7	990
52	When a virus is not a parasite: the beneficial effects of prophages on bacterial fitness. <i>Journal of Microbiology</i> , 2014, 52, 235-242.	1.3	210
53	CRISPR-Cas system: a powerful tool for genome engineering. <i>Plant Molecular Biology</i> , 2014, 85, 209-218.	2.0	51
54	Genome-wide binding of the CRISPR endonuclease Cas9 in mammalian cells. <i>Nature Biotechnology</i> , 2014, 32, 670-676.	9.4	829
55	CRISPR-Cas Systems: Prokaryotes Upgrade to Adaptive Immunity. <i>Molecular Cell</i> , 2014, 54, 234-244.	4.5	633
56	Natural selection and infectious disease in human populations. <i>Nature Reviews Genetics</i> , 2014, 15, 379-393.	7.7	353

#	ARTICLE	IF	CITATIONS
57	Paths of Resistance to EGFR Inhibitors: Is NF Enough?. <i>Cancer Discovery</i> , 2014, 4, 519-521.	7.7	7
58	Genome-wide analysis reveals characteristics of off-target sites bound by the Cas9 endonuclease. <i>Nature Biotechnology</i> , 2014, 32, 677-683.	9.4	682
59	The <sc>CRISPR</sc>/<sc>C</sc>as9 system produces specific and homozygous targeted gene editing in rice in one generation. <i>Plant Biotechnology Journal</i> , 2014, 12, 797-807.	4.1	726
60	Large-scale de novo DNA synthesis: technologies and applications. <i>Nature Methods</i> , 2014, 11, 499-507.	9.0	644
61	Accelerating genome editing in CHO cells using CRISPR Cas9 and CRISPy, a web-based target finding tool. <i>Biotechnology and Bioengineering</i> , 2014, 111, 1604-1616.	1.7	167
62	Unlocking the Treasure Trove: From Genes to Schizophrenia Biology. <i>Schizophrenia Bulletin</i> , 2014, 40, 492-496.	2.3	19
63	Improving CRISPR-Cas nuclease specificity using truncated guide RNAs. <i>Nature Biotechnology</i> , 2014, 32, 279-284.	9.4	1,706
64	Cas9-Based Tools for Targeted Genome Editing and Transcriptional Control. <i>Applied and Environmental Microbiology</i> , 2014, 80, 1544-1552.	1.4	59
65	Megabase-scale deletion using CRISPR/Cas9 to generate a fully haploid human cell line. <i>Genome Research</i> , 2014, 24, 2059-2065.	2.4	238
66	Genetic and Genomic Tools for the Marine Annelid <i>Platynereis dumerilii</i> . <i>Genetics</i> , 2014, 197, 19-31.	1.2	63
67	Genome Editing in Human Stem Cells. <i>Methods in Enzymology</i> , 2014, 546, 119-138.	0.4	81
68	Guide RNA Functional Modules Direct Cas9 Activity and Orthogonality. <i>Molecular Cell</i> , 2014, 56, 333-339.	4.5	214
69	Building high-resolution synthetic lethal networks: a "Google map" of the cancer cell. <i>Trends in Molecular Medicine</i> , 2014, 20, 704-715.	3.5	26
70	Multiplex CRISPR/Cas9-based genome engineering from a single lentiviral vector. <i>Nucleic Acids Research</i> , 2014, 42, e147-e147.	6.5	301
71	Target specificity of the CRISPR-Cas9 system. <i>Quantitative Biology</i> , 2014, 2, 59-70.	0.3	262
72	Combating neurodegenerative disease with chemical probes and model systems. <i>Nature Chemical Biology</i> , 2014, 10, 911-920.	3.9	43
73	CRISPR/Cas9 mediated generation of stable chondrocyte cell lines with targeted gene knockouts; analysis of an aggrecan knockout cell line. <i>Bone</i> , 2014, 69, 118-125.	1.4	25
74	Characterization of Genomic Deletion Efficiency Mediated by Clustered Regularly Interspaced Palindromic Repeats (CRISPR)/Cas9 Nuclease System in Mammalian Cells*. <i>Journal of Biological Chemistry</i> , 2014, 289, 21312-21324.	1.6	309

#	ARTICLE	IF	CITATIONS
75	Genome engineering: the next genomic revolution. <i>Nature Methods</i> , 2014, 11, 1009-1011.	9.0	26
76	Editing and investigating genomes with TALE and CRISPR/Cas systems: Applications of artificial TALE and CRISPR-Cas systems. <i>Methods</i> , 2014, 69, 119-120.	1.9	2
77	RNA-guided endonuclease provides a therapeutic strategy to cure latent herpesviridae infection. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2014, 111, 13157-13162.	3.3	188
78	Cellular reprogramming by transcription factor engineering. <i>Current Opinion in Genetics and Development</i> , 2014, 28, 1-9.	1.5	7
79	Genome-Scale CRISPR-Mediated Control of Gene Repression and Activation. <i>Cell</i> , 2014, 159, 647-661.	13.5	2,176
80	Drugging the undruggable RAS: Mission Possible?. <i>Nature Reviews Drug Discovery</i> , 2014, 13, 828-851.	21.5	1,484
81	A double-edged sword: R loops as threats to genome integrity and powerful regulators of gene expression. <i>Genes and Development</i> , 2014, 28, 1384-1396.	2.7	432
82	Systematically labeling developmental stage-specific genes for the study of pancreatic β -cell differentiation from human embryonic stem cells. <i>Cell Research</i> , 2014, 24, 1181-1200.	5.7	41
83	The genome editing toolbox: a spectrum of approaches for targeted modification. <i>Current Opinion in Biotechnology</i> , 2014, 30, 87-94.	3.3	31
84	Dissecting mammalian immunity through mutation. <i>Immunology and Cell Biology</i> , 2014, 92, 392-399.	1.0	21
85	Improved vectors and genome-wide libraries for CRISPR screening. <i>Nature Methods</i> , 2014, 11, 783-784.	9.0	4,032
86	iPipet: sample handling using a tablet. <i>Nature Methods</i> , 2014, 11, 784-785.	9.0	14
87	Conditional targeting of <i>Isl1</i> using paired Cas9 nickase and a single DNA template in mice. <i>FEBS Open Bio</i> , 2014, 4, 637-642.	1.0	36
88	Conditional Knockouts Generated by Engineered CRISPR-Cas9 Endonuclease Reveal the Roles of Coronin in <i>C. elegans</i> Neural Development. <i>Developmental Cell</i> , 2014, 30, 625-636.	3.1	139
89	Inactivation of the Human Papillomavirus E6 or E7 Gene in Cervical Carcinoma Cells by Using a Bacterial CRISPR/Cas RNA-Guided Endonuclease. <i>Journal of Virology</i> , 2014, 88, 11965-11972.	1.5	232
90	Small RNAs: A New Paradigm in Plant-Microbe Interactions. <i>Annual Review of Phytopathology</i> , 2014, 52, 495-516.	3.5	192
91	RNAi screening comes of age: improved techniques and complementary approaches. <i>Nature Reviews Molecular Cell Biology</i> , 2014, 15, 591-600.	16.1	289
92	Genome modification by CRISPR/Cas9. <i>FEBS Journal</i> , 2014, 281, 5186-5193.	2.2	139

#	ARTICLE	IF	CITATIONS
93	Rational design of highly active sgRNAs for CRISPR-Cas9-mediated gene inactivation. <i>Nature Biotechnology</i> , 2014, 32, 1262-1267.	9.4	1,351
94	Impact of RNA-Guided Technologies for Target Identification and Deconvolution. <i>Journal of Biomolecular Screening</i> , 2014, 19, 1327-1337.	2.6	18
95	Genomic Editing Tools to Model Human Diseases with Isogenic Pluripotent Stem Cells. <i>Stem Cells and Development</i> , 2014, 23, 2673-2686.	1.1	51
96	CRISPR-Cas9 Knockin Mice for Genome Editing and Cancer Modeling. <i>Cell</i> , 2014, 159, 440-455.	13.5	1,566
97	Saturation editing of genomic regions by multiplex homology-directed repair. <i>Nature</i> , 2014, 513, 120-123.	13.7	301
98	DNA Repair Mechanisms and Their Biological Roles in the Malaria Parasite <i>Plasmodium falciparum</i> . <i>Microbiology and Molecular Biology Reviews</i> , 2014, 78, 469-486.	2.9	88
99	Identification and consequences of miRNA-target interactions beyond repression of gene expression. <i>Nature Reviews Genetics</i> , 2014, 15, 599-612.	7.7	556
100	Phenotypic Directed Antibody Selection. <i>Chemistry and Biology</i> , 2014, 21, 170-171.	6.2	3
101	Functional genomics platform for pooled screening and generation of mammalian genetic interaction maps. <i>Nature Protocols</i> , 2014, 9, 1825-1847.	5.5	79
102	Genome wide functional genetics in haploid cells. <i>FEBS Letters</i> , 2014, 588, 2415-2421.	1.3	20
103	Engineering synthetic TALE and CRISPR/Cas9 transcription factors for regulating gene expression. <i>Methods</i> , 2014, 69, 188-197.	1.9	36
104	CRISPR-Cas9 knockout screening for functional genomics. <i>Science China Life Sciences</i> , 2014, 57, 733-734.	2.3	3
105	The future of drug discovery: enabling technologies for enhancing lead characterization and profiling therapeutic potential. <i>Expert Opinion on Drug Discovery</i> , 2014, 9, 847-858.	2.5	11
106	A CRISPR view of development. <i>Genes and Development</i> , 2014, 28, 1859-1872.	2.7	194
107	CRISPR/Cas9-mediated genome engineering: An adeno-associated viral (AAV) vector toolbox. <i>Biotechnology Journal</i> , 2014, 9, 1402-1412.	1.8	235
108	Cancer mouse models: Past, present and future. <i>Seminars in Cell and Developmental Biology</i> , 2014, 27, 54-60.	2.3	46
109	The genome revolution and its role in understanding complex diseases. <i>Biochimica Et Biophysica Acta - Molecular Basis of Disease</i> , 2014, 1842, 1889-1895.	1.8	48
110	CHOPCHOP: a CRISPR/Cas9 and TALEN web tool for genome editing. <i>Nucleic Acids Research</i> , 2014, 42, W401-W407.	6.5	997

#	ARTICLE	IF	CITATIONS
111	Applications of TALENs and CRISPR/Cas9 in Human Cells and Their Potentials for Gene Therapy. <i>Molecular Biotechnology</i> , 2014, 56, 681-688.	1.3	36
112	Disrupting the male germ line to find infertility and contraception targets. <i>Annales D'Endocrinologie</i> , 2014, 75, 101-108.	0.6	17
113	An expanding role for RAS GTPase activating proteins (RAS GAPs) in cancer. <i>Advances in Biological Regulation</i> , 2014, 55, 1-14.	1.4	136
114	CRISPR/Cas9 and Genome Editing in Drosophila. <i>Journal of Genetics and Genomics</i> , 2014, 41, 7-19.	1.7	174
115	When Half Is Better Than the Whole: Advances in Haploid Embryonic Stem Cell Technology. <i>Cell Stem Cell</i> , 2014, 14, 265-267.	5.2	13
116	Development and Applications of CRISPR-Cas9 for Genome Engineering. <i>Cell</i> , 2014, 157, 1262-1278.	13.5	4,607
117	DrugTargetSeqR: a genomics- and CRISPR-Cas9-based method to analyze drug targets. <i>Nature Chemical Biology</i> , 2014, 10, 626-628.	3.9	110
118	Generation of mouse models of myeloid malignancy with combinatorial genetic lesions using CRISPR-Cas9 genome editing. <i>Nature Biotechnology</i> , 2014, 32, 941-946.	9.4	477
119	Genome-wide analyses of proliferation-important genes of Iridovirus-tiger frog virus by RNAi. <i>Virus Research</i> , 2014, 189, 214-225.	1.1	6
120	Expanding the genetic editing tool kit: ZFNs, TALENs, and CRISPR-Cas9. <i>Journal of Clinical Investigation</i> , 2014, 124, 4154-4161.	3.9	369
122	Genetic rearrangements of variable di-residue (RVD)-containing repeat arrays in a baculoviral TALEN system. <i>Molecular Therapy - Methods and Clinical Development</i> , 2014, 1, 14050.	1.8	16
123	Interview with Bryan R Cullen. <i>Future Virology</i> , 2014, 9, 345-350.	0.9	0
124	CRISPR/Cas9-mediated genome engineering of CHO cell factories: Application and perspectives. <i>Biotechnology Journal</i> , 2015, 10, 979-994.	1.8	104
125	Genome editing of CXCR4 by CRISPR/cas9 confers cells resistant to HIV-1 infection. <i>Scientific Reports</i> , 2015, 5, 15577.	1.6	172
126	Synthesis of an arrayed sgRNA library targeting the human genome. <i>Scientific Reports</i> , 2015, 5, 14987.	1.6	46
127	Assembly and Validation of Versatile Transcription Activator-Like Effector Libraries. <i>Scientific Reports</i> , 2014, 4, 4857.	1.6	7
128	Extensive mapping of an innate immune network with CRISPR. <i>Molecular Systems Biology</i> , 2015, 11, 821.	3.2	2
129	antaRNA Multi-objective inverse folding of pseudoknot RNA using ant-colony optimization. <i>BMC Bioinformatics</i> , 2015, 16, 389.	1.2	19

#	ARTICLE	IF	CITATIONS
130	DECKO: Single-oligo, dual-CRISPR deletion of genomic elements including long non-coding RNAs. BMC Genomics, 2015, 16, 846.	1.2	100
131	Integrating transcriptional and protein interaction networks to prioritize condition-specific master regulators. BMC Systems Biology, 2015, 9, 80.	3.0	27
132	Human cytomegalovirus TRS1 protein associates with the 7â€methylguanosine mRNA cap and facilitates translation. Proteomics, 2015, 15, 1983-1994.	1.3	14
133	Genome editing through large insertion leads to the skipping of targeted exon. BMC Genomics, 2015, 16, 1082.	1.2	15
134	The utility of transposon mutagenesis for cancer studies in the era of genome editing. Genome Biology, 2015, 16, 229.	3.8	28
135	What Does Genetics Tell Us About Age-Related Macular Degeneration?. Annual Review of Vision Science, 2015, 1, 73-96.	2.3	21
136	<scp>CRISPR</scp> screen: a highâ€throughput approach for cancer genetic research. Clinical Genetics, 2015, 88, 32-33.	1.0	1
137	CRISPR/Cas9 Genome Editing System in Drosophila. Advanced Techniques in Biology & Medicine, 0, s1, .	0.1	1
138	The apparent permeabilities of Caco-2 cells to marketed drugs: magnitude, and independence from both biophysical properties and endogenite similarities. PeerJ, 2015, 3, e1405.	0.9	39
139	Minimizing off-Target Mutagenesis Risks Caused by Programmable Nucleases. International Journal of Molecular Sciences, 2015, 16, 24751-24771.	1.8	28
140	Multiplexed CRISPR/Cas9 genome editing increases the efficacy of homologous-dependent repair of donor sequences in mammalian cells. South African Journal of Science, 2015, 111, 7.	0.3	0
141	Cancer Cell Line Panels Empower Genomics-Based Discovery of Precision Cancer Medicine. Yonsei Medical Journal, 2015, 56, 1186.	0.9	14
142	Direct Injection of CRISPR/Cas9-Related mRNA into Cytoplasm of Parthenogenetically Activated Porcine Oocytes Causes Frequent Mosaicism for Indel Mutations. International Journal of Molecular Sciences, 2015, 16, 17838-17856.	1.8	55
143	Genome Editing Using Mammalian Haploid Cells. International Journal of Molecular Sciences, 2015, 16, 23604-23614.	1.8	17
144	A new age in functional genomics using CRISPR/Cas9 in arrayed library screening. Frontiers in Genetics, 2015, 6, 300.	1.1	96
145	Novel Genome-Editing Tools to Model and Correct Primary Immunodeficiencies. Frontiers in Immunology, 2015, 6, 250.	2.2	32
146	Neuroprotective therapies in glaucoma: II. Genetic nanotechnology tools. Frontiers in Neuroscience, 2015, 9, 355.	1.4	14
149	CRISPR/Cas9-Mediated Rapid Generation of Multiple Mouse Lines Identified Ccdc63 as Essential for Spermiogenesis. International Journal of Molecular Sciences, 2015, 16, 24732-24750.	1.8	51

#	ARTICLE	IF	CITATIONS
150	The Characteristics of Heterozygous Protein Truncating Variants in the Human Genome. PLoS Computational Biology, 2015, 11, e1004647.	1.5	34
151	Does Tyrosyl DNA Phosphodiesterase-2 Play a Role in Hepatitis B Virus Genome Repair?. PLoS ONE, 2015, 10, e0128401.	1.1	69
152	Genome-Wide Screening of Genes Required for Glycosylphosphatidylinositol Biosynthesis. PLoS ONE, 2015, 10, e0138553.	1.1	19
153	Function genomics of abiotic stress tolerance in plants: a CRISPR approach. Frontiers in Plant Science, 2015, 6, 375.	1.7	87
154	Integrative Analysis of CRISPR/Cas9 Target Sites in the Human <i>HBB</i> Gene. BioMed Research International, 2015, 2015, 1-9.	0.9	12
155	RNase L is a negative regulator of cell migration. Oncotarget, 2015, 6, 44360-44372.	0.8	32
156	Applications of the CRISPR-Cas9 system in cancer biology. Nature Reviews Cancer, 2015, 15, 387-393.	12.8	340
157	Expanding the Biologist's Toolkit with CRISPR-Cas9. Molecular Cell, 2015, 58, 568-574.	4.5	351
158	Choosing the Right Tool for the Job: RNAi, TALEN, or CRISPR. Molecular Cell, 2015, 58, 575-585.	4.5	374
159	Regulation of transcriptionally active genes via the catalytically inactive Cas9 in <i>C. elegans</i> and <i>D. rerio</i> . Cell Research, 2015, 25, 638-641.	5.7	62
160	Inference of transcriptional regulation in cancers. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, 7731-7736.	3.3	84
161	Lung Stem Cells in the Epithelium and Vasculature. Pancreatic Islet Biology, 2015, , .	0.1	1
162	A Toolkit of CRISPR-Based Genome Editing Systems in <i>Drosophila</i> . Journal of Genetics and Genomics, 2015, 42, 141-149.	1.7	44
163	CRISPR-Cas9-mediated gene knockout in primary human airway epithelial cells reveals a proinflammatory role for MUC18. Gene Therapy, 2015, 22, 822-829.	2.3	86
164	High-Throughput Silencing Using the CRISPR-Cas9 System: A Review of the Benefits and Challenges. Journal of Biomolecular Screening, 2015, 20, 1027-1039.	2.6	31
165	CRISPR-Cas9-mediated genome editing and guide RNA design. Mammalian Genome, 2015, 26, 501-510.	1.0	53
166	Rapid and highly efficient mammalian cell engineering via Cas9 protein transfection. Journal of Biotechnology, 2015, 208, 44-53.	1.9	587
167	Sequence determinants of improved CRISPR sgRNA design. Genome Research, 2015, 25, 1147-1157.	2.4	514

#	ARTICLE	IF	CITATIONS
168	Engineering Sequence-Specific DNA Binding Proteins for Antiviral Gene Editing. , 2015, , 63-94.		4
169	A Perspective on the Future of High-Throughput RNAi Screening: Will CRISPR Cut Out the Competition or Can RNAi Help Guide the Way?. Journal of Biomolecular Screening, 2015, 20, 1040-1051.	2.6	32
170	Collateral Lethality: A New Therapeutic Strategy in Oncology. Trends in Cancer, 2015, 1, 161-173.	3.8	106
171	Specific induction of endogenous viral restriction factors using CRISPR/Cas-derived transcriptional activators. Proceedings of the National Academy of Sciences of the United States of America, 2015, 112, E7249-56.	3.3	45
172	antaRNA: ant colony-based RNA sequence design. Bioinformatics, 2015, 31, 3114-3121.	1.8	35
173	PAM multiplicity marks genomic target sites as inhibitory to CRISPR-Cas9 editing. Nature Communications, 2015, 6, 10124.	5.8	52
174	Covalent Modification of Bacteriophage T4 DNA Inhibits CRISPR-Cas9. MBio, 2015, 6, e00648.	1.8	87
175	A Platform for Reverse Genetics in Endothelial Cells. Circulation Research, 2015, 117, 107-108.	2.0	5
176	CRISPR/Cas9 system as an innovative genetic engineering tool: Enhancements in sequence specificity and delivery methods. Biochimica Et Biophysica Acta: Reviews on Cancer, 2015, 1856, 234-243.	3.3	19
177	Nodes-and-connections RNAi knockdown screening: identification of a signaling molecule network involved in fulvestrant action and breast cancer prognosis. Oncogenesis, 2015, 4, e172-e172.	2.1	0
178	WU-CRISPR: characteristics of functional guide RNAs for the CRISPR/Cas9 system. Genome Biology, 2015, 16, 218.	3.8	268
179	Quality control, modeling, and visualization of CRISPR screens with MAGeCK-VISPR. Genome Biology, 2015, 16, 281.	3.8	330
180	Resources for the design of CRISPR gene editing experiments. Genome Biology, 2015, 16, 260.	3.8	91
181	Optimizing sgRNA structure to improve CRISPR-Cas9 knockout efficiency. Genome Biology, 2015, 16, 280.	3.8	290
182	Modeling Normal and Disordered Human Hematopoiesis. Trends in Cancer, 2015, 1, 199-210.	3.8	10
183	The CENP-L-N Complex Forms a Critical Node in an Integrated Meshwork of Interactions at the Centromere-Kinetochore Interface. Molecular Cell, 2015, 60, 886-898.	4.5	146
184	Genome-wide CRISPR-Cas9 Screens Reveal Loss of Redundancy between PKMYT1 and WEE1 in Glioblastoma Stem-like Cells. Cell Reports, 2015, 13, 2425-2439.	2.9	146
185	HDAC6 activity is a non-oncogene addiction hub for inflammatory breast cancers. Breast Cancer Research, 2015, 17, 149.	2.2	42

#	ARTICLE	IF	CITATIONS
186	Current and future delivery systems for engineered nucleases: ZFN, TALEN and RGEN. <i>Journal of Controlled Release</i> , 2015, 205, 120-127.	4.8	93
187	Massively parallel single-amino-acid mutagenesis. <i>Nature Methods</i> , 2015, 12, 203-206.	9.0	153
188	Suppression of hepatitis B virus DNA accumulation in chronically infected cells using a bacterial CRISPR/Cas RNA-guided DNA endonuclease. <i>Virology</i> , 2015, 476, 196-205.	1.1	202
189	New Insight into Cancer Aneuploidy in Zebrafish. <i>International Review of Cell and Molecular Biology</i> , 2015, 314, 149-170.	1.6	2
190	CRISPR genome engineering and viral gene delivery: A case of mutual attraction. <i>Biotechnology Journal</i> , 2015, 10, 258-272.	1.8	73
191	Functional genomic screening approaches in mechanistic toxicology and potential future applications of CRISPR-Cas9. <i>Mutation Research - Reviews in Mutation Research</i> , 2015, 764, 31-42.	2.4	23
192	Pluripotent stem cell derived cardiovascular progenitors – A developmental perspective. <i>Developmental Biology</i> , 2015, 400, 169-179.	0.9	45
193	A practical guide to induced pluripotent stem cell research using patient samples. <i>Laboratory Investigation</i> , 2015, 95, 4-13.	1.7	58
194	Small Molecules Enhance CRISPR Genome Editing in Pluripotent Stem Cells. <i>Cell Stem Cell</i> , 2015, 16, 142-147.	5.2	372
195	CRISPR/Cas9: The Leading Edge of Genome Editing Technology. , 2015, , 25-41.		12
196	The impact of CRISPR-Cas9 on target identification and validation. <i>Drug Discovery Today</i> , 2015, 20, 450-457.	3.2	56
197	CRISPR: a new method for genetic engineering – A prokaryotic immune component may potentially open a new era of gene silencing. <i>Cell Death and Differentiation</i> , 2015, 22, 3-5.	5.0	6
198	Targeted Genome Editing Using Site-Specific Nucleases. , 2015, , .		7
199	Unbiased detection of off-target cleavage by CRISPR-Cas9 and TALENs using integrase-defective lentiviral vectors. <i>Nature Biotechnology</i> , 2015, 33, 175-178.	9.4	395
200	High-throughput screens in mammalian cells using the CRISPR-Cas9 system. <i>FEBS Journal</i> , 2015, 282, 2089-2096.	2.2	51
201	A CRISPR/Cas9 Vector System for Tissue-Specific Gene Disruption in Zebrafish. <i>Developmental Cell</i> , 2015, 32, 756-764.	3.1	325
202	Bacterial CRISPR/Cas DNA endonucleases: A revolutionary technology that could dramatically impact viral research and treatment. <i>Virology</i> , 2015, 479-480, 213-220.	1.1	53
203	Genetic screens and functional genomics using CRISPR/Cas9 technology. <i>FEBS Journal</i> , 2015, 282, 1383-1393.	2.2	82

#	ARTICLE	IF	CITATIONS
204	Genome-wide CRISPR Screen in a Mouse Model of Tumor Growth and Metastasis. <i>Cell</i> , 2015, 160, 1246-1260.	13.5	746
205	Dual sgRNA-directed gene knockout using CRISPR/Cas9 technology in <i>Caenorhabditis elegans</i> . <i>Scientific Reports</i> , 2014, 4, 7581.	1.6	121
206	Genome Engineering for Therapeutic Applications. , 2015, , 27-43.		4
207	Next-generation libraries for robust RNA interference-based genome-wide screens. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2015, 112, E3384-91.	3.3	83
208	CRISPR-ERA: a comprehensive design tool for CRISPR-mediated gene editing, repression and activation: Fig. 1.. <i>Bioinformatics</i> , 2015, 31, 3676-3678.	1.8	171
209	A detailed procedure for CRISPR/Cas9-mediated gene editing in <i>Arabidopsis thaliana</i> . <i>Science Bulletin</i> , 2015, 60, 1332-1347.	4.3	34
210	A pre-screening FISH-based method to detect CRISPR/Cas9 off-targets in mouse embryonic stem cells. <i>Scientific Reports</i> , 2015, 5, 12327.	1.6	20
211	An Essential Role of the Mitochondrial Electron Transport Chain in Cell Proliferation Is to Enable Aspartate Synthesis. <i>Cell</i> , 2015, 162, 540-551.	13.5	1,024
212	Using large-scale genomics data to identify driver mutations in lung cancer: methods and challenges. <i>Pharmacogenomics</i> , 2015, 16, 1149-1160.	0.6	15
213	Highly Efficient Genome Editing via CRISPR/Cas9 to Create Clock Gene Knockout Cells. <i>Journal of Biological Rhythms</i> , 2015, 30, 389-395.	1.4	21
214	Recent strategies and progress in identifying host factors involved in virus replication. <i>Current Opinion in Microbiology</i> , 2015, 26, 79-88.	2.3	22
215	CRISPR-Cas9-Mediated Genome Editing in <i>Leishmania donovani</i> . <i>MBio</i> , 2015, 6, e00861.	1.8	168
216	The EBNA3 Family of Epstein-Barr Virus Nuclear Proteins Associates with the USP46/USP12 Deubiquitination Complexes to Regulate Lymphoblastoid Cell Line Growth. <i>PLoS Pathogens</i> , 2015, 11, e1004822.	2.1	40
217	The Renaissance of Developmental Biology. <i>PLoS Biology</i> , 2015, 13, e1002149.	2.6	26
218	Enriching CRISPR-Cas9 targeted cells by co-targeting the HPRT gene. <i>Nucleic Acids Research</i> , 2015, 43, gkv675.	6.5	36
219	Application of CRISPR/Cas9 for biomedical discoveries. <i>Cell and Bioscience</i> , 2015, 5, 33.	2.1	52
220	CRISPR-Cas9-Mediated Genetic Screening in Mice with Haploid Embryonic Stem Cells Carrying a Guide RNA Library. <i>Cell Stem Cell</i> , 2015, 17, 221-232.	5.2	91
221	Precision cancer mouse models through genome editing with CRISPR-Cas9. <i>Genome Medicine</i> , 2015, 7, 53.	3.6	88

#	ARTICLE	IF	CITATIONS
222	The Hope for iPSC in Lung Stem Cell Therapy and Disease Modeling. <i>Pancreatic Islet Biology</i> , 2015, , 113-143.	0.1	1
223	A CRISPR-Based Screen Identifies Genes Essential for West-Nile-Virus-Induced Cell Death. <i>Cell Reports</i> , 2015, 12, 673-683.	2.9	207
224	Systematic analysis of CRISPRâ€‘Cas9 mismatch tolerance reveals low levels of off-target activity. <i>Journal of Biotechnology</i> , 2015, 211, 56-65.	1.9	135
225	Enzymatically Generated CRISPR Libraries for Genome Labeling and Screening. <i>Developmental Cell</i> , 2015, 34, 373-378.	3.1	32
226	CRISPR-Cas: New Tools for Genetic Manipulations from Bacterial Immunity Systems. <i>Annual Review of Microbiology</i> , 2015, 69, 209-228.	2.9	160
227	An Inducible Lentiviral Guide RNA Platform Enables the Identification of Tumor-Essential Genes and Tumor-Promoting Mutations InÂVivo. <i>Cell Reports</i> , 2015, 10, 1422-1432.	2.9	337
228	A Genome-wide CRISPR Screen in Primary Immune Cells to Dissect Regulatory Networks. <i>Cell</i> , 2015, 162, 675-686.	13.5	383
229	Delivery and Specificity of CRISPR/Cas9 Genome Editing Technologies for Human Gene Therapy. <i>Human Gene Therapy</i> , 2015, 26, 443-451.	1.4	157
230	In vivo RNAi screens: concepts and applications. <i>Trends in Immunology</i> , 2015, 36, 315-322.	2.9	18
231	Cas9-chromatin binding information enables more accurate CRISPR off-target prediction. <i>Nucleic Acids Research</i> , 2015, 43, e118-e118.	6.5	187
233	Efficient Genome Editing in <i>Clostridium cellulolyticum</i> via CRISPR-Cas9 Nickase. <i>Applied and Environmental Microbiology</i> , 2015, 81, 4423-4431.	1.4	195
234	Cell-Based Screening: Extracting Meaning from Complex Data. <i>Neuron</i> , 2015, 86, 160-174.	3.8	37
235	Silencing of end-joining repair for efficient site-specific gene insertion after TALEN/CRISPR mutagenesis in <i>Aedes aegypti</i> . <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2015, 112, 4038-4043.	3.3	141
236	TP53 loss creates therapeutic vulnerability inÂColorectal cancer. <i>Nature</i> , 2015, 520, 697-701.	13.7	192
237	Generation of outbred Ace2 knockout mice by RNA transfection of TALENs displaying colitis reminiscent pathophysiology and inflammation. <i>Transgenic Research</i> , 2015, 24, 433-446.	1.3	14
238	The CRISPR/Cas9 system inactivates latent HIV-1 proviral DNA. <i>Retrovirology</i> , 2015, 12, 22.	0.9	189
239	RNA-guided CRISPR-Cas technologies for genome-scale investigation of disease processes. <i>Journal of Hematology and Oncology</i> , 2015, 8, 31.	6.9	8
240	Synthetic epigeneticsâ€‘towards intelligent control of epigenetic states and cell identity. <i>Clinical Epigenetics</i> , 2015, 7, 18.	1.8	59

#	ARTICLE	IF	CITATIONS
241	Probing the Virus Host Interaction in High Containment: An Approach Using Pooled Short Hairpin RNA. Assay and Drug Development Technologies, 2015, 13, 34-43.	0.6	3
242	Opposing Roles for the lncRNA Haunt and Its Genomic Locus in Regulating HOXA Gene Activation during Embryonic Stem Cell Differentiation. Cell Stem Cell, 2015, 16, 504-516.	5.2	247
243	Synthesis of Boron- and Silicon-Containing Amino Acids through Copper-Catalysed Conjugate Additions to Dehydroalanine Derivatives. European Journal of Organic Chemistry, 2015, 2015, 3352-3360.	1.2	44
244	Application guide for omics approaches to cell signaling. Nature Chemical Biology, 2015, 11, 387-397.	3.9	69
245	Toward stem cell-based phenotypic screens for neurodegenerative diseases. Nature Reviews Neurology, 2015, 11, 339-350.	4.9	65
246	Applications of CRISPR-Cas9 mediated genome engineering. Military Medical Research, 2015, 2, 11.	1.9	28
247	HiTSelect: a comprehensive tool for high-complexity-pooled screen analysis. Nucleic Acids Research, 2015, 43, e16-e16.	6.5	56
248	Quantifying the impact of transporters on cellular drug permeability. Trends in Pharmacological Sciences, 2015, 36, 255-262.	4.0	32
249	Systems biology of the secretory pathway: What have we learned so far?. Biology of the Cell, 2015, 107, 205-217.	0.7	11
250	Dramatic Enhancement of Genome Editing by CRISPR/Cas9 Through Improved Guide RNA Design. Genetics, 2015, 199, 959-971.	1.2	210
251	Increasing the efficiency of precise genome editing with CRISPR-Cas9 by inhibition of nonhomologous end joining. Nature Biotechnology, 2015, 33, 538-542.	9.4	945
252	A lncRNA-MAF:MAFB Transcription Factor Network Regulates Epidermal Differentiation. Developmental Cell, 2015, 32, 693-706.	3.1	172
253	Identification of a large set of rare complete human knockouts. Nature Genetics, 2015, 47, 448-452.	9.4	214
254	Discovery of cancer drug targets by CRISPR-Cas9 screening of protein domains. Nature Biotechnology, 2015, 33, 661-667.	9.4	630
255	The history and market impact of CRISPR RNA-guided nucleases. Current Opinion in Virology, 2015, 12, 85-90.	2.6	31
256	Efficient Gene Disruption in Cultured Primary Human Endothelial Cells by CRISPR/Cas9. Circulation Research, 2015, 117, 121-128.	2.0	64
257	Decoding the complex genetic causes of heart diseases using systems biology. Biophysical Reviews, 2015, 7, 141-159.	1.5	0
258	RAS Synthetic Lethal Screens Revisited: Still Seeking the Elusive Prize?. Clinical Cancer Research, 2015, 21, 1802-1809.	3.2	146

#	ARTICLE	IF	CITATIONS
259	Autophagy and checkpoints for intracellular pathogen defense. <i>Current Opinion in Gastroenterology</i> , 2015, 31, 14-23.	1.0	38
260	Advances in CRISPR-Cas9 genome engineering: lessons learned from RNA interference. <i>Nucleic Acids Research</i> , 2015, 43, 3407-3419.	6.5	124
261	Application of CRISPR/Cas9 genome editing to the study and treatment of disease. <i>Archives of Toxicology</i> , 2015, 89, 1023-1034.	1.9	47
262	SHMT2 drives glioma cell survival in ischaemia but imposes a dependence on glycine clearance. <i>Nature</i> , 2015, 520, 363-367.	13.7	303
263	Efficient inversions and duplications of mammalian regulatory DNA elements and gene clusters by CRISPR/Cas9. <i>Journal of Molecular Cell Biology</i> , 2015, 7, 284-298.	1.5	116
264	High-throughput functional genomics using CRISPR-Cas9. <i>Nature Reviews Genetics</i> , 2015, 16, 299-311.	7.7	998
265	Small molecule-triggered Cas9 protein with improved genome-editing specificity. <i>Nature Chemical Biology</i> , 2015, 11, 316-318.	3.9	364
266	The CRISPR-Cas immune system: Biology, mechanisms and applications. <i>Biochimie</i> , 2015, 117, 119-128.	1.3	367
267	Rapid reverse genetic screening using CRISPR in zebrafish. <i>Nature Methods</i> , 2015, 12, 535-540.	9.0	330
268	Enabling functional genomics with genome engineering. <i>Genome Research</i> , 2015, 25, 1442-1455.	2.4	89
269	AMPK Protects Leukemia-Initiating Cells in Myeloid Leukemias from Metabolic Stress in the Bone Marrow. <i>Cell Stem Cell</i> , 2015, 17, 585-596.	5.2	200
270	Modeling Disease In Vivo With CRISPR/Cas9. <i>Trends in Molecular Medicine</i> , 2015, 21, 609-621.	3.5	91
271	Tracking and transforming neocortical progenitors by CRISPR/Cas9 gene targeting and PiggyBac transposase lineage labeling. <i>Development (Cambridge)</i> , 2015, 142, 3601-11.	1.2	56
272	Functional Genomics in Pharmaceutical Drug Discovery. <i>Handbook of Experimental Pharmacology</i> , 2015, 232, 25-41.	0.9	4
273	CRISPR/Cas9 somatic multiplex-mutagenesis for high-throughput functional cancer genomics in mice. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2015, 112, 13982-13987.	3.3	172
274	Combining CRISPR/Cas9 and rAAV Templates for Efficient Gene Editing. <i>Nucleic Acid Therapeutics</i> , 2015, 25, 287-296.	2.0	26
275	CRISPR-Cas9 delivery to hard-to-transfect cells via membrane deformation. <i>Science Advances</i> , 2015, 1, e1500454.	4.7	190
276	Efficient delivery of nuclease proteins for genome editing in human stem cells and primary cells. <i>Nature Protocols</i> , 2015, 10, 1842-1859.	5.5	113

#	ARTICLE	IF	CITATIONS
277	Targeted Chromosomal Translocations and Essential Gene Knockout Using CRISPR/Cas9 Technology in <i>Caenorhabditis elegans</i> . <i>Genetics</i> , 2015, 201, 1295-1306.	1.2	32
278	Network analysis of gene essentiality in functional genomics experiments. <i>Genome Biology</i> , 2015, 16, 239.	3.8	50
279	CRISPR EATING on a Low Budget. <i>Developmental Cell</i> , 2015, 34, 253-254.	3.1	1
280	Targeting Transcription Factors in Cancer. <i>Trends in Cancer</i> , 2015, 1, 53-65.	3.8	247
281	ScreenBEAM: a novel meta-analysis algorithm for functional genomics screens via Bayesian hierarchical modeling. <i>Bioinformatics</i> , 2016, 32, 260-267.	1.8	40
282	Identification and characterization of essential genes in the human genome. <i>Science</i> , 2015, 350, 1096-1101.	6.0	1,461
283	Identification of potential drug targets for tuberous sclerosis complex by synthetic screens combining CRISPR-based knockouts with RNAi. <i>Science Signaling</i> , 2015, 8, rs9.	1.6	113
284	A Scalable Genome-Editing-Based Approach for Mapping Multiprotein Complexes in Human Cells. <i>Cell Reports</i> , 2015, 13, 621-633.	2.9	93
285	Discovery and resupply of pharmacologically active plant-derived natural products: A review. <i>Biotechnology Advances</i> , 2015, 33, 1582-1614.	6.0	1,871
286	Massively parallel high-order combinatorial genetics in human cells. <i>Nature Biotechnology</i> , 2015, 33, 952-961.	9.4	50
287	Overview of guide RNA design tools for CRISPR-Cas9 genome editing technology. <i>Frontiers in Biology</i> , 2015, 10, 289-296.	0.7	25
288	CRISPRscan: designing highly efficient sgRNAs for CRISPR-Cas9 targeting in vivo. <i>Nature Methods</i> , 2015, 12, 982-988.	9.0	1,024
289	Rapid and efficient one-step generation of paired gRNA CRISPR-Cas9 libraries. <i>Nature Communications</i> , 2015, 6, 8083.	5.8	109
290	Streamlined Genome Engineering with a Self-Excising Drug Selection Cassette. <i>Genetics</i> , 2015, 200, 1035-1049.	1.2	557
291	Applications of comparative evolution to human disease genetics. <i>Current Opinion in Genetics and Development</i> , 2015, 35, 16-24.	1.5	7
292	Conditionally Stabilized dCas9 Activator for Controlling Gene Expression in Human Cell Reprogramming and Differentiation. <i>Stem Cell Reports</i> , 2015, 5, 448-459.	2.3	158
293	A modular open platform for systematic functional studies under physiological conditions. <i>Nucleic Acids Research</i> , 2015, 43, e112-e112.	6.5	39
294	Metabolic reprogramming and dysregulated metabolism: cause, consequence and/or enabler of environmental carcinogenesis?. <i>Carcinogenesis</i> , 2015, 36, S203-S231.	1.3	93

#	ARTICLE	IF	CITATIONS
295	BCL11A enhancer dissection by Cas9-mediated in situ saturating mutagenesis. <i>Nature</i> , 2015, 527, 192-197.	13.7	726
296	The New State of the Art: Cas9 for Gene Activation and Repression. <i>Molecular and Cellular Biology</i> , 2015, 35, 3800-3809.	1.1	197
297	Electroporation Knows No Boundaries: The Use of Electrostimulation for siRNA Delivery in Cells and Tissues. <i>Journal of Biomolecular Screening</i> , 2015, 20, 932-942.	2.6	38
298	Regulatory RNA-assisted genome engineering in microorganisms. <i>Current Opinion in Biotechnology</i> , 2015, 36, 85-90.	3.3	19
299	Cas9-Assisted Targeting of CHromosome segments CATCH enables one-step targeted cloning of large gene clusters. <i>Nature Communications</i> , 2015, 6, 8101.	5.8	213
300	Off-target Effects in CRISPR/Cas9-mediated Genome Engineering. <i>Molecular Therapy - Nucleic Acids</i> , 2015, 4, e264.	2.3	872
301	The Power Decoder Simulator for the Evaluation of Pooled shRNA Screen Performance. <i>Journal of Biomolecular Screening</i> , 2015, 20, 965-975.	2.6	3
302	Human stem cell-based disease modeling: prospects and challenges. <i>Current Opinion in Cell Biology</i> , 2015, 37, 84-90.	2.6	31
303	A Genome-Wide CRISPR Library for High-Throughput Genetic Screening in <i>Drosophila</i> Cells. <i>Journal of Genetics and Genomics</i> , 2015, 42, 301-309.	1.7	52
304	High-Resolution CRISPR Screens Reveal Fitness Genes and Genotype-Specific Cancer Liabilities. <i>Cell</i> , 2015, 163, 1515-1526.	13.5	1,339
305	Functional genomics to uncover drug mechanism of action. <i>Nature Chemical Biology</i> , 2015, 11, 942-948.	3.9	70
306	From hacking the human genome to editing organs. <i>Organogenesis</i> , 2015, 11, 173-182.	0.4	2
307	Biological Networks Governing the Acquisition, Maintenance, and Dissolution of Pluripotency: Insights from Functional Genomics Approaches. <i>Cold Spring Harbor Symposia on Quantitative Biology</i> , 2015, 80, 189-198.	2.0	2
308	A new way to target p53-defective colorectal cancer. <i>Future Oncology</i> , 2015, 11, 3101-3104.	1.1	8
309	Nucleosomes Inhibit Cas9 Endonuclease Activity <i>in Vitro</i> . <i>Biochemistry</i> , 2015, 54, 7063-7066.	1.2	102
310	CRISPR/Cas9: An inexpensive, efficient loss of function tool to screen human disease genes in <i>Xenopus</i> . <i>Developmental Biology</i> , 2015, 408, 196-204.	0.9	134
311	53BP1 and the LINC Complex Promote Microtubule-Dependent DSB Mobility and DNA Repair. <i>Cell</i> , 2015, 163, 880-893.	13.5	251
312	Editing plant genomes with CRISPR/Cas9. <i>Current Opinion in Biotechnology</i> , 2015, 32, 76-84.	3.3	456

#	ARTICLE	IF	CITATIONS
313	The CRISPR/Cas9 system for plant genome editing and beyond. <i>Biotechnology Advances</i> , 2015, 33, 41-52.	6.0	968
314	Single-cell and multivariate approaches in genetic perturbation screens. <i>Nature Reviews Genetics</i> , 2015, 16, 18-32.	7.7	80
315	Genome-scale RNAi screens for high-throughput phenotyping in bloodstream-form African trypanosomes. <i>Nature Protocols</i> , 2015, 10, 106-133.	5.5	49
316	CRISPRdirect: software for designing CRISPR/Cas guide RNA with reduced off-target sites. <i>Bioinformatics</i> , 2015, 31, 1120-1123.	1.8	935
317	Genome-scale transcriptional activation by an engineered CRISPR-Cas9 complex. <i>Nature</i> , 2015, 517, 583-588.	13.7	2,272
318	Multi-kilobase homozygous targeted gene replacement in human induced pluripotent stem cells. <i>Nucleic Acids Research</i> , 2015, 43, e21-e21.	6.5	147
319	High-Efficiency Multiplex Genome Editing of <i>Streptomyces</i> Species Using an Engineered CRISPR/Cas System. <i>ACS Synthetic Biology</i> , 2015, 4, 723-728.	1.9	473
320	Genome Editing by Targeted Chromosomal Mutagenesis. <i>Methods in Molecular Biology</i> , 2015, 1239, 1-13.	0.4	9
321	Synthetic Lethal Vulnerabilities of Cancer. <i>Annual Review of Pharmacology and Toxicology</i> , 2015, 55, 513-531.	4.2	38
322	Mitochondrial Targets for Pharmacological Intervention in Human Disease. <i>Journal of Proteome Research</i> , 2015, 14, 5-21.	1.8	40
323	Off-target assessment of CRISPR-Cas9 guiding RNAs in human iPSC and mouse ES cells. <i>Genesis</i> , 2015, 53, 225-236.	0.8	55
324	Comparative assessments of CRISPR-Cas nucleases™ cleavage efficiency in planta. <i>Plant Molecular Biology</i> , 2015, 87, 143-156.	2.0	70
325	Synthetic Biology for Therapeutic Applications. <i>Molecular Pharmaceutics</i> , 2015, 12, 322-331.	2.3	25
326	Homology-Integrated CRISPR-Cas (HI-CRISPR) System for One-Step Multigene Disruption in <i>Saccharomyces cerevisiae</i> . <i>ACS Synthetic Biology</i> , 2015, 4, 585-594.	1.9	308
327	Gene Correction Technology and Its Impact on Viral Research and Therapy. , 2016, , .		0
328	Complex Genetic Control of Autoimmune Disease. , 2016, , 133-141.		0
329	Molecular Chipper: Functional Mapping of the Non-Coding Genome with CRISPR. <i>Journal of Next Generation Sequencing & Applications</i> , 2016, 3, .	0.3	1
330	CRISPR-Cas9: from Genome Editing to Cancer Research. <i>International Journal of Biological Sciences</i> , 2016, 12, 1427-1436.	2.6	31

#	ARTICLE	IF	CITATIONS
331	Gene Insertion and Deletion in Mosquitoes. , 2016, , 139-168.		4
332	A CRISPR-Based Toolbox for Studying T Cell Signal Transduction. BioMed Research International, 2016, 2016, 1-10.	0.9	24
333	The Rise of CRISPR/Cas for Genome Editing in Stem Cells. Stem Cells International, 2016, 2016, 1-17.	1.2	21
334	Functional CRISPR screening identifies the ufmylation pathway as a regulator of SQSTM1/p62. ELife, 2016, 5, .	2.8	122
335	Targeting Stromal-Cancer Cell Crosstalk Networks in Ovarian Cancer Treatment. Biomolecules, 2016, 6, 3.	1.8	43
336	RNA Interference in the Age of CRISPR: Will CRISPR Interfere with RNAi?. International Journal of Molecular Sciences, 2016, 17, 291.	1.8	68
337	In Vivo Delivery Systems for Therapeutic Genome Editing. International Journal of Molecular Sciences, 2016, 17, 626.	1.8	71
338	Targeted Genome Editing via CRISPR in the Pathogen <i>Cryptococcus neoformans</i> . PLoS ONE, 2016, 11, e0164322.	1.1	55
339	Design, execution, and analysis of pooled <i>in vitro</i> CRISPR/Cas9 screens. FEBS Journal, 2016, 283, 3170-3180.	2.2	66
340	CRISPR guide RNA design for research applications. FEBS Journal, 2016, 283, 3232-3238.	2.2	74
341	Genome Editing by CRISPR/Cas9: A Game Change in the Genetic Manipulation of Protists. Journal of Eukaryotic Microbiology, 2016, 63, 679-690.	0.8	55
342	The genetic architecture of type 2 diabetes. Nature, 2016, 536, 41-47.	13.7	952
343	On the Origin of CRISPR-Cas Technology: From Prokaryotes to Mammals. Trends in Microbiology, 2016, 24, 811-820.	3.5	143
344	CRISPR-DO for genome-wide CRISPR design and optimization. Bioinformatics, 2016, 32, 3336-3338.	1.8	46
345	CRISPR/Cas9: a breakthrough in generating mouse models for endocrinologists. Journal of Molecular Endocrinology, 2016, 57, R81-R92.	1.1	11
346	Microfluidic Cell Deformability Assay for Rapid and Efficient Kinase Screening with the CRISPR-Cas9 System. Angewandte Chemie, 2016, 128, 8703-8707.	1.6	6
347	Microfluidic Cell Deformability Assay for Rapid and Efficient Kinase Screening with the CRISPR-Cas9 System. Angewandte Chemie - International Edition, 2016, 55, 8561-8565.	7.2	26
348	Current and future prospects for CRISPR-based tools in bacteria. Biotechnology and Bioengineering, 2016, 113, 930-943.	1.7	100

#	ARTICLE	IF	CITATIONS
349	CRISPR-Cas9 systems: versatile cancer modelling platforms and promising therapeutic strategies. <i>International Journal of Cancer</i> , 2016, 138, 1328-1336.	2.3	26
350	Stacking up CRISPR against RNAi for therapeutic gene inhibition. <i>FEBS Journal</i> , 2016, 283, 3249-3260.	2.2	15
351	Evaluation of off-target and on-target scoring algorithms and integration into the guide RNA selection tool CRISPOR. <i>Genome Biology</i> , 2016, 17, 148.	3.8	1,334
352	CRISPR: a versatile tool for both forward and reverse genetics research. <i>Human Genetics</i> , 2016, 135, 971-976.	1.8	41
353	Primary ovarian insufficiency associated with autosomal abnormalities: from chromosome to genome-wide and beyond. <i>Menopause</i> , 2016, 23, 806-815.	0.8	7
354	Versatility of chemically synthesized guide RNAs for CRISPR-Cas9 genome editing. <i>Journal of Biotechnology</i> , 2016, 233, 74-83.	1.9	73
355	Somatic mutations in disorders with disrupted brain connectivity. <i>Experimental and Molecular Medicine</i> , 2016, 48, e239-e239.	3.2	25
356	Applying CRISPR-Cas9 tools to identify and characterize transcriptional enhancers. <i>Nature Reviews Molecular Cell Biology</i> , 2016, 17, 597-604.	16.1	54
357	Sequence features associated with the cleavage efficiency of CRISPR/Cas9 system. <i>Scientific Reports</i> , 2016, 6, 19675.	1.6	141
358	Protein stability regulators screening assay (Pro-SRSA): protein degradation meets the CRISPR-Cas9 library. <i>Chinese Journal of Cancer</i> , 2016, 35, 60.	4.9	2
359	Overview of CRISPR-Cas9 Biology. <i>Cold Spring Harbor Protocols</i> , 2016, 2016, pdb.top088849.	0.2	14
360	MicroRNA-202 maintains spermatogonial stem cells by inhibiting cell cycle regulators and RNA binding proteins. <i>Nucleic Acids Research</i> , 2017, 45, gkw1287.	6.5	74
361	CT-Finder: A Web Service for CRISPR Optimal Target Prediction and Visualization. <i>Scientific Reports</i> , 2016, 6, 25516.	1.6	36
362	A method to convert mRNA into a gRNA library for CRISPR/Cas9 editing of any organism. <i>Science Advances</i> , 2016, 2, e1600699.	4.7	17
363	SIRT7-dependent deacetylation of the U3-55k protein controls pre-rRNA processing. <i>Nature Communications</i> , 2016, 7, 10734.	5.8	96
364	Reprogramming cell fate with a genome-scale library of artificial transcription factors. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016, 113, E8257-E8266.	3.3	23
365	A pH- and ionic strength-dependent conformational change in the neck region regulates DNMR1 function in dendritic cells. <i>EMBO Journal</i> , 2016, 35, 2484-2497.	3.5	27
366	PAR1 Scaffolds TGF β 2RII to Downregulate TGF β 2 Signaling and Activate ESC Differentiation to Endothelial Cells. <i>Stem Cell Reports</i> , 2016, 7, 1050-1058.	2.3	14

#	ARTICLE	IF	CITATIONS
367	Targeting <scp>DNA</scp> repair, <scp>DNA</scp> metabolism and replication stress as anti-cancer strategies. FEBS Journal, 2016, 283, 232-245.	2.2	100
368	On-demand continuous-flow production of pharmaceuticals in a compact, reconfigurable system. Science, 2016, 352, 61-67.	6.0	751
369	Genome Editing in Human Pluripotent Stem Cells. Cold Spring Harbor Protocols, 2016, 2016, pdb.top086819.	0.2	5
370	Decoding transcriptional enhancers: Evolving from annotation to functional interpretation. Seminars in Cell and Developmental Biology, 2016, 57, 40-50.	2.3	11
371	CRISPR/Cas9 for Human Genome Engineering and Disease Research. Annual Review of Genomics and Human Genetics, 2016, 17, 131-154.	2.5	80
372	Focal Adhesion Kinase Regulates the DNA Damage Response and Its Inhibition Radiosensitizes Mutant <i>KRAS</i> Lung Cancer. Clinical Cancer Research, 2016, 22, 5851-5863.	3.2	67
373	Complete Spectrum of CRISPR/Cas9-induced Mutations on HBV cccDNA. Molecular Therapy, 2016, 24, 1258-1266.	3.7	117
374	Genome engineering in ophthalmology: Application of CRISPR/Cas to the treatment of eye disease. Progress in Retinal and Eye Research, 2016, 53, 1-20.	7.3	42
375	Regulation of DNA double-strand break repair by ubiquitin and ubiquitin-like modifiers. Nature Reviews Molecular Cell Biology, 2016, 17, 379-394.	16.1	285
376	Genome editing in pluripotent stem cells: research and therapeutic applications. Biochemical and Biophysical Research Communications, 2016, 473, 665-674.	1.0	17
377	Immunoblot screening of CRISPR/Cas9-mediated gene knockouts without selection. BMC Molecular Biology, 2016, 17, 9.	3.0	8
378	The Application of CRISPR/Cas9 Technologies and Therapies in Stem Cells. Current Stem Cell Reports, 2016, 2, 95-103.	0.7	2
379	FOXA1 defines cancer cell specificity. Science Advances, 2016, 2, e1501473.	4.7	41
380	Synthetic biology platform technologies for antimicrobial applications. Advanced Drug Delivery Reviews, 2016, 105, 35-43.	6.6	39
381	A CRISPR Path to Engineering New Genetic Mouse Models for Cardiovascular Research. Arteriosclerosis, Thrombosis, and Vascular Biology, 2016, 36, 1058-1075.	1.1	44
382	Targeting Non-proteolytic Protein Ubiquitination for the Treatment of Diffuse Large B Cell Lymphoma. Cancer Cell, 2016, 29, 494-507.	7.7	93
383	Consequences of Cas9 cleavage in the chromosome of <i>Escherichia coli</i>. Nucleic Acids Research, 2016, 44, 4243-4251.	6.5	225
384	Imaging Specific Genomic DNA in Living Cells. Annual Review of Biophysics, 2016, 45, 1-23.	4.5	67

#	ARTICLE	IF	CITATIONS
385	Engineering Delivery Vehicles for Genome Editing. Annual Review of Chemical and Biomolecular Engineering, 2016, 7, 637-662.	3.3	93
386	Systematic comparison of CRISPR/Cas9 and RNAi screens for essential genes. Nature Biotechnology, 2016, 34, 634-636.	9.4	359
387	Genome Editing with CRISPR-Cas9: Can It Get Any Better?. Journal of Genetics and Genomics, 2016, 43, 239-250.	1.7	59
388	DNA-guided genome editing using the <i>Natronobacterium gregoryi</i> Argonaute. Nature Biotechnology, 2016, 34, 768-773.	9.4	154
389	Induced Pluripotent Stem Cells Meet Genome Editing. Cell Stem Cell, 2016, 18, 573-586.	5.2	398
390	Network-based approaches for analysis of complex biological systems. Current Opinion in Biotechnology, 2016, 39, 157-166.	3.3	71
391	CRISPR knockout screening outperforms shRNA and CRISPRi in identifying essential genes. Nature Biotechnology, 2016, 34, 631-633.	9.4	344
392	A PHGDH inhibitor reveals coordination of serine synthesis and one-carbon unit fate. Nature Chemical Biology, 2016, 12, 452-458.	3.9	389
393	CRISPR/Cas9 in Genome Editing and Beyond. Annual Review of Biochemistry, 2016, 85, 227-264.	5.0	897
394	BIN1 regulates BACE1 intracellular trafficking and amyloid- β production. Human Molecular Genetics, 2016, 25, ddw146.	1.4	67
395	Screening out irrelevant cell-based models of disease. Nature Reviews Drug Discovery, 2016, 15, 751-769.	21.5	402
396	The epigenome: the next substrate for engineering. Genome Biology, 2016, 17, 183.	3.8	44
397	Cas9-Mediated Genome Engineering in <i>Drosophila melanogaster</i> . Cold Spring Harbor Protocols, 2016, 2016, pdb.top086843.	0.2	18
398	A Genome-wide CRISPR Screen in <i>Toxoplasma</i> Identifies Essential Apicomplexan Genes. Cell, 2016, 166, 1423-1435.e12.	13.5	667
399	Efficient CRISPR/Cas9-Mediated Versatile, Predictable, and Donor-Free Gene Knockout in Human Pluripotent Stem Cells. Stem Cell Reports, 2016, 7, 496-507.	2.3	40
400	Applications of CRISPR technologies in research and beyond. Nature Biotechnology, 2016, 34, 933-941.	9.4	735
401	Patterns of CRISPR/Cas9 activity in plants, animals and microbes. Plant Biotechnology Journal, 2016, 14, 2203-2216.	4.1	141
402	Guide RNA engineering for versatile Cas9 functionality. Nucleic Acids Research, 2016, 44, gkw908.	6.5	55

#	ARTICLE	IF	CITATIONS
403	Genetic and Proteomic Interrogation of Lower Confidence Candidate Genes Reveals Signaling Networks in β -Catenin-Active Cancers. <i>Cell Systems</i> , 2016, 3, 302-316.e4.	2.9	55
404	CRISPR-Cas: biology, mechanisms and relevance. <i>Philosophical Transactions of the Royal Society B: Biological Sciences</i> , 2016, 371, 20150496.	1.8	308
405	Systematic mapping of functional enhancer-promoter connections with CRISPR interference. <i>Science</i> , 2016, 354, 769-773.	6.0	512
406	Identification of oncogenic driver mutations by genome-wide CRISPR-Cas9 dropout screening. <i>BMC Genomics</i> , 2016, 17, 723.	1.2	31
407	Challenges of CRISPR/Cas9 applications for long non-coding RNA genes. <i>Nucleic Acids Research</i> , 2017, 45, gkw883.	6.5	138
408	Synthetic lethality in lung cancer and translation to clinical therapies. <i>Molecular Cancer</i> , 2016, 15, 61.	7.9	31
409	Optimization Strategies for the CRISPR-Cas9 Genome-Editing System. <i>Cold Spring Harbor Protocols</i> , 2016, 2016, pdb.top090894.	0.2	8
410	Efficient CRISPR-mediated mutagenesis in primary immune cells using CrispRGold and a C57BL/6 Cas9 transgenic mouse line. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016, 113, 12514-12519.	3.3	110
411	Progress in Gene Editing Transgenesis Genome Manipulation in Mosquitoes. <i>Advances in Insect Physiology</i> , 2016, 51, 1-35.	1.1	0
412	Genome-Editing Technologies: Principles and Applications. <i>Cold Spring Harbor Perspectives in Biology</i> , 2016, 8, a023754.	2.3	209
413	Targeted AID-mediated mutagenesis (TAM) enables efficient genomic diversification in mammalian cells. <i>Nature Methods</i> , 2016, 13, 1029-1035.	9.0	346
414	Minimal genome: Worthwhile or worthless efforts toward being smaller?. <i>Biotechnology Journal</i> , 2016, 11, 199-211.	1.8	45
415	Epigenomic engineering for Down syndrome. <i>Neuroscience and Biobehavioral Reviews</i> , 2016, 71, 323-327.	2.9	15
416	CRISPR-Cas9 gene editing: Delivery aspects and therapeutic potential. <i>Journal of Controlled Release</i> , 2016, 244, 139-148.	4.8	52
417	DNA Repair Profiling Reveals Nonrandom Outcomes at Cas9-Mediated Breaks. <i>Molecular Cell</i> , 2016, 63, 633-646.	4.5	394
418	Diverse evolutionary roots and mechanistic variations of the CRISPR-Cas systems. <i>Science</i> , 2016, 353, aad5147.	6.0	523
419	Gene discovery and genome editing to develop cisgenic crops with improved resistance against pathogen infection. <i>Canadian Journal of Plant Pathology</i> , 2016, 38, 279-295.	0.8	17
420	Functional Toxicogenomic Assessment of Triclosan in Human HepG2 Cells Using Genome-Wide CRISPR-Cas9 Screening. <i>Environmental Science & Technology</i> , 2016, 50, 10682-10692.	4.6	45

#	ARTICLE	IF	CITATIONS
421	CRISPR/Cas9 genome editing in human pluripotent stem cells: Harnessing human genetics in a dish. <i>Developmental Dynamics</i> , 2016, 245, 788-806.	0.8	20
422	Generation and application of mammalian haploid embryonic stem cells. <i>Journal of Internal Medicine</i> , 2016, 280, 236-245.	2.7	22
423	Application of CRISPR-Cas system in gene therapy: Pre-clinical progress in animal model. <i>DNA Repair</i> , 2016, 46, 1-8.	1.3	10
424	Exploiting the CRISPR/Cas9 system to study alternative splicing in vivo: application to titin. <i>Human Molecular Genetics</i> , 2016, 25, ddw280.	1.4	21
425	Genetic Engineering in Stem Cell Biomanufacturing. , 2016, , 1-25.		0
426	At the Conflux of Human Genome Engineering and Induced Pluripotency. , 2016, , 45-64.		1
427	Generation of porcine fetal fibroblasts expressing the tetracycline-inducible Cas9 gene by somatic cell nuclear transfer. <i>Molecular Medicine Reports</i> , 2016, 14, 2527-2533.	1.1	4
428	Tissue-specific gene targeting using CRISPR/Cas9. <i>Methods in Cell Biology</i> , 2016, 135, 189-202.	0.5	25
429	Multiplex conditional mutagenesis in zebrafish using the CRISPR/Cas system. <i>Methods in Cell Biology</i> , 2016, 135, 3-17.	0.5	16
430	CRISPR-Cas9 mediated genetic engineering for the purification of the endogenous integrator complex from mammalian cells. <i>Protein Expression and Purification</i> , 2016, 128, 101-108.	0.6	17
431	CRISPR technologies for bacterial systems: Current achievements and future directions. <i>Biotechnology Advances</i> , 2016, 34, 1180-1209.	6.0	124
432	Somatic Engineering of Oncogenic Chromosomal Rearrangements: A Perspective. <i>Cancer Research</i> , 2016, 76, 4918-4923.	0.4	7
433	Genome Editing with Targetable Nucleases. , 2016, , 1-29.		0
434	Back to the Future: Mutant Hunts Are Still the Way To Go. <i>Genetics</i> , 2016, 203, 1007-1010.	1.2	7
435	Genetic dissection of mammalian ERAD through comparative haploid and CRISPR forward genetic screens. <i>Nature Communications</i> , 2016, 7, 11786.	5.8	64
436	Development of Commercial Thermo-sensitive Genic Male Sterile Rice Accelerates Hybrid Rice Breeding Using the CRISPR/Cas9-mediated TMS5 Editing System. <i>Scientific Reports</i> , 2016, 6, 37395.	1.6	183
437	CORALINA: a universal method for the generation of gRNA libraries for CRISPR-based screening. <i>BMC Genomics</i> , 2016, 17, 917.	1.2	16
438	A CRISPR-Cas9 Assisted Non-Homologous End-Joining Strategy for One-step Engineering of Bacterial Genome. <i>Scientific Reports</i> , 2016, 6, 37895.	1.6	95

#	ARTICLE	IF	CITATIONS
439	Genome editing: A breakthrough in life science and medicine [Review]. <i>Endocrine Journal</i> , 2016, 63, 105-110.	0.7	12
440	<scp>CRISPR</scp>â€Cas9 technology and its application in haematological disorders. <i>British Journal of Haematology</i> , 2016, 175, 208-225.	1.2	22
441	Determining antigen specificity of a monoclonal antibody using genome-scale CRISPR-Cas9 knockout library. <i>Journal of Immunological Methods</i> , 2016, 439, 8-14.	0.6	9
442	CRISPR-Cas9 therapeutics in cancer: promising strategies and present challenges. <i>Biochimica Et Biophysica Acta: Reviews on Cancer</i> , 2016, 1866, 197-207.	3.3	45
443	A chemical-inducible CRISPRâ€Cas9 system for rapid control of genome editing. <i>Nature Chemical Biology</i> , 2016, 12, 980-987.	3.9	176
444	High-Efficiency Genome Editing of <i>Streptomyces</i> Species by an Engineered CRISPR/Cas System. <i>Methods in Enzymology</i> , 2016, 575, 271-284.	0.4	24
445	An easy and efficient inducible CRISPR/Cas9 platform with improved specificity for multiple gene targeting. <i>Nucleic Acids Research</i> , 2016, 44, gkw660.	6.5	158
446	Methods of genome engineering: a new era of molecular biology. <i>Biochemistry (Moscow)</i> , 2016, 81, 662-677.	0.7	7
447	Practical Considerations for Using Pooled Lentiviral CRISPR Libraries. <i>Current Protocols in Molecular Biology</i> , 2016, 115, 31.5.1-31.5.13.	2.9	14
448	CRISPR/Cas9 Screens Reveal Requirements for Host Cell Sulfation and Fucosylation in Bacterial Type III Secretion System-Mediated Cytotoxicity. <i>Cell Host and Microbe</i> , 2016, 20, 226-237.	5.1	64
449	The present and future of genome editing in cancer research. <i>Human Genetics</i> , 2016, 135, 1083-1092.	1.8	13
450	Investigating essential gene function in<i>Mycobacterium tuberculosis</i> using an efficient CRISPR interference system. <i>Nucleic Acids Research</i> , 2016, 44, e143-e143.	6.5	127
451	CRISPR-Cas9 System as a Versatile Tool for Genome Engineering in Human Cells. <i>Molecular Therapy - Nucleic Acids</i> , 2016, 5, e388.	2.3	22
452	Inhibition of JCPyV infection mediated by targeted viral genome editing using CRISPR/Cas9. <i>Scientific Reports</i> , 2016, 6, 36921.	1.6	27
453	A Modular Assembly Platform for Rapid Generation of DNA Constructs. <i>Scientific Reports</i> , 2016, 6, 16836.	1.6	54
454	Increasing the performance of pooled CRISPRâ€Cas9 drop-out screening. <i>Scientific Reports</i> , 2016, 6, 31782.	1.6	27
455	Delivery methods for site-specific nucleases: Achieving the full potential of therapeutic gene editing. <i>Journal of Controlled Release</i> , 2016, 244, 83-97.	4.8	17
456	Making the cut in the dark genome. <i>Science</i> , 2016, 354, 705-706.	6.0	3

#	ARTICLE	IF	CITATIONS
457	Internal guide RNA interactions interfere with Cas9-mediated cleavage. <i>Nature Communications</i> , 2016, 7, 11750.	5.8	133
458	Functional Genomic Characterization of Cancer Genomes. <i>Cold Spring Harbor Symposia on Quantitative Biology</i> , 2016, 81, 237-246.	2.0	17
459	A Molecular Chipper technology for CRISPR sgRNA library generation and functional mapping of noncoding regions. <i>Nature Communications</i> , 2016, 7, 11178.	5.8	19
460	Local regulation of gene expression by lncRNA promoters, transcription and splicing. <i>Nature</i> , 2016, 539, 452-455.	13.7	1,056
461	Selection of highly efficient sgRNAs for CRISPR/Cas9-based plant genome editing. <i>Scientific Reports</i> , 2016, 6, 21451.	1.6	167
462	Endonuclease mediated genome editing in drug discovery and development: promises and challenges. <i>Drug Discovery Today: Technologies</i> , 2016, 21-22, 17-25.	4.0	2
463	Zebrafish Genome Engineering Using the CRISPR-Cas9 System. <i>Trends in Genetics</i> , 2016, 32, 815-827.	2.9	128
464	A CRISPR Dropout Screen Identifies Genetic Vulnerabilities and Therapeutic Targets in Acute Myeloid Leukemia. <i>Cell Reports</i> , 2016, 17, 1193-1205.	2.9	556
465	Real-time observation of DNA recognition and rejection by the RNA-guided endonuclease Cas9. <i>Nature Communications</i> , 2016, 7, 12778.	5.8	221
466	Elimination of HIV-1 Genomes from Human T-lymphoid Cells by CRISPR/Cas9 Gene Editing. <i>Scientific Reports</i> , 2016, 6, 22555.	1.6	250
467	A genome-scale CRISPR-Cas9 screening method for protein stability reveals novel regulators of Cdc25A. <i>Cell Discovery</i> , 2016, 2, 16014.	3.1	25
468	CRISPR/Cas in genome defense and gene editing. <i>Acta Chimica Slovaca</i> , 2016, 9, 68-74.	0.5	0
469	CNS disease models with human pluripotent stem cells in the CRISPR age. <i>Current Opinion in Cell Biology</i> , 2016, 43, 96-103.	2.6	19
470	CRISPR/Cas9-mediated efficient and heritable targeted mutagenesis in tomato plants in the first and later generations. <i>Scientific Reports</i> , 2016, 6, 24765.	1.6	303
471	Genome-scale deletion screening of human long non-coding RNAs using a paired-guide RNA CRISPR-Cas9 library. <i>Nature Biotechnology</i> , 2016, 34, 1279-1286.	9.4	380
472	Directed evolution using dCas9-targeted somatic hypermutation in mammalian cells. <i>Nature Methods</i> , 2016, 13, 1036-1042.	9.0	378
473	KCTD12 Regulates Colorectal Cancer Cell Stemness through the ERK Pathway. <i>Scientific Reports</i> , 2016, 6, 20460.	1.6	34
474	Simultaneous generation of multi-gene knockouts in human cells. <i>FEBS Letters</i> , 2016, 590, 4343-4353.	1.3	10

#	ARTICLE	IF	CITATIONS
475	Clustered regulatory interspaced short palindromic repeats (CRISPR)-mediated mutagenesis and phenotype rescue by <i>piggyBac</i> transgenesis in a nonmodel <i>Drosophila</i> species. <i>Insect Molecular Biology</i> , 2016, 25, 355-361.	1.0	18
476	Death receptor-based enrichment of Cas9-expressing cells. <i>BMC Biotechnology</i> , 2016, 16, 17.	1.7	12
477	RNA therapeutics – The potential treatment for myocardial infarction. <i>Regenerative Therapy</i> , 2016, 4, 83-91.	1.4	5
478	Versatile in vivo regulation of tumor phenotypes by dCas9-mediated transcriptional perturbation. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016, 113, E3892-900.	3.3	87
479	A CRISPR screen defines a signal peptide processing pathway required by flaviviruses. <i>Nature</i> , 2016, 535, 164-168.	13.7	327
480	Genetic dissection of Flaviviridae host factors through genome-scale CRISPR screens. <i>Nature</i> , 2016, 535, 159-163.	13.7	360
481	Insert, remove or replace: A highly advanced genome editing system using CRISPR/Cas9. <i>Biochimica Et Biophysica Acta - Molecular Cell Research</i> , 2016, 1863, 2333-2344.	1.9	112
482	The Clustered, Regularly Interspaced, Short Palindromic Repeats-associated Endonuclease 9 (CRISPR/Cas9)-created MDM2 T309G Mutation Enhances Vitreous-induced Expression of MDM2 and Proliferation and Survival of Cells. <i>Journal of Biological Chemistry</i> , 2016, 291, 16339-16347.	1.6	28
483	Development of a CRISPR-Cas9 Tool Kit for Comprehensive Engineering of <i>Bacillus subtilis</i> . <i>Applied and Environmental Microbiology</i> , 2016, 82, 4876-4895.	1.4	157
485	CRISPR/Cas9: From Genome Engineering to Cancer Drug Discovery. <i>Trends in Cancer</i> , 2016, 2, 313-324.	3.8	43
486	CRISPR Screens Provide a Comprehensive Assessment of Cancer Vulnerabilities but Generate False-Positive Hits for Highly Amplified Genomic Regions. <i>Cancer Discovery</i> , 2016, 6, 900-913.	7.7	320
487	Genomic Copy Number Dictates a Gene-Independent Cell Response to CRISPR/Cas9 Targeting. <i>Cancer Discovery</i> , 2016, 6, 914-929.	7.7	485
488	BAGEL: a computational framework for identifying essential genes from pooled library screens. <i>BMC Bioinformatics</i> , 2016, 17, 164.	1.2	216
489	Express photolithographic DNA microarray synthesis with optimized chemistry and high-efficiency photolabile groups. <i>Journal of Nanobiotechnology</i> , 2016, 14, 14.	4.2	34
490	Meeting report: GARNet/OpenPlant CRISPR-Cas workshop. <i>Plant Methods</i> , 2016, 12, 6.	1.9	6
491	Cancer Drug Development Using <i>Drosophila</i> as an in vivo Tool: From Bedside to Bench and Back. <i>Trends in Pharmacological Sciences</i> , 2016, 37, 789-806.	4.0	59
492	The CENP-T/W complex is a binding partner of the histone chaperone FACT. <i>Genes and Development</i> , 2016, 30, 1313-1326.	2.7	45
493	CHOPCHOP v2: a web tool for the next generation of CRISPR genome engineering. <i>Nucleic Acids Research</i> , 2016, 44, W272-W276.	6.5	801

#	ARTICLE	IF	CITATIONS
494	Genetic screens to study the immune system in cancer. <i>Current Opinion in Immunology</i> , 2016, 41, 55-61.	2.4	15
495	Expanding CRISPR/Cas9 Genome Editing Capacity in Zebrafish Using SaCas9. <i>G3: Genes, Genomes, Genetics</i> , 2016, 6, 2517-2521.	0.8	18
496	Cellular Therapies: Gene Editing and Next-Gen CAR T Cells. , 2016, , 203-247.		1
497	Off-target effects of engineered nucleases. <i>FEBS Journal</i> , 2016, 283, 3239-3248.	2.2	71
498	High-throughput mapping of regulatory DNA. <i>Nature Biotechnology</i> , 2016, 34, 167-174.	9.4	217
499	A new class of temporarily phenotypic enhancers identified by CRISPR/Cas9-mediated genetic screening. <i>Genome Research</i> , 2016, 26, 397-405.	2.4	111
500	Expanding the CRISPR imaging toolset with <i>Staphylococcus aureus</i> Cas9 for simultaneous imaging of multiple genomic loci. <i>Nucleic Acids Research</i> , 2016, 44, e75-e75.	6.5	155
501	High-Content Analysis of CRISPR-Cas9 Gene-Edited Human Embryonic Stem Cells. <i>Stem Cell Reports</i> , 2016, 6, 109-120.	2.3	23
502	Optimized sgRNA design to maximize activity and minimize off-target effects of CRISPR-Cas9. <i>Nature Biotechnology</i> , 2016, 34, 184-191.	9.4	3,168
503	Beyond editing: repurposing CRISPR-Cas9 for precision genome regulation and interrogation. <i>Nature Reviews Molecular Cell Biology</i> , 2016, 17, 5-15.	16.1	698
504	CRISPR-Cas9 for medical genetic screens: applications and future perspectives. <i>Journal of Medical Genetics</i> , 2016, 53, 91-97.	1.5	45
505	Towards a compendium of essential genes – From model organisms to synthetic lethality in cancer cells. <i>Critical Reviews in Biochemistry and Molecular Biology</i> , 2016, 51, 74-85.	2.3	42
506	Modeling Alzheimer's disease with human induced pluripotent stem (iPS) cells. <i>Molecular and Cellular Neurosciences</i> , 2016, 73, 13-31.	1.0	100
507	Long-term dual-color tracking of genomic loci by modified sgRNAs of the CRISPR/Cas9 system. <i>Nucleic Acids Research</i> , 2016, 44, e86-e86.	6.5	138
508	Engineering the AAVS1 locus for consistent and scalable transgene expression in human iPSCs and their differentiated derivatives. <i>Methods</i> , 2016, 101, 43-55.	1.9	150
509	Establishment of a highly efficient virus-inducible CRISPR/Cas9 system in insect cells. <i>Antiviral Research</i> , 2016, 130, 50-57.	1.9	55
510	CRISPR/Cas9: an advanced tool for editing plant genomes. <i>Transgenic Research</i> , 2016, 25, 561-573.	1.3	89
511	Potential pitfalls of CRISPR/Cas9-mediated genome editing. <i>FEBS Journal</i> , 2016, 283, 1218-1231.	2.2	196

#	ARTICLE	IF	CITATIONS
512	CRISPR library designer (CLD): software for multispecies design of single guide RNA libraries. <i>Genome Biology</i> , 2016, 17, 55.	3.8	68
513	NCG 5.0: updates of a manually curated repository of cancer genes and associated properties from cancer mutational screenings. <i>Nucleic Acids Research</i> , 2016, 44, D992-D999.	6.5	95
514	Parallel shRNA and CRISPR-Cas9 screens enable antiviral drug target identification. <i>Nature Chemical Biology</i> , 2016, 12, 361-366.	3.9	157
515	Next-generation bis-locked nucleic acids with stacking linker and 2-ε-glycylamino-LNA show enhanced DNA invasion into supercoiled duplexes. <i>Nucleic Acids Research</i> , 2016, 44, 2007-2019.	6.5	24
516	Understanding Spatial Genome Organization: Methods and Insights. <i>Genomics, Proteomics and Bioinformatics</i> , 2016, 14, 7-20.	3.0	54
517	Disordered methionine metabolism in MTAP/CDKN2A-deleted cancers leads to dependence on PRMT5. <i>Science</i> , 2016, 351, 1208-1213.	6.0	374
518	Multiplexed barcoded CRISPR-Cas9 screening enabled by CombiGEM. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016, 113, 2544-2549.	3.3	210
519	Activation of RNase L is dependent on OAS3 expression during infection with diverse human viruses. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2016, 113, 2241-2246.	3.3	221
520	Advances and perspectives on the use of CRISPR/Cas9 systems in plant genomics research. <i>Current Opinion in Plant Biology</i> , 2016, 30, 70-77.	3.5	94
521	Post-translational Regulation of Cas9 during G1 Enhances Homology-Directed Repair. <i>Cell Reports</i> , 2016, 14, 1555-1566.	2.9	237
522	A Minor Subset of Super Elongation Complexes Plays a Predominant Role in Reversing HIV-1 Latency. <i>Molecular and Cellular Biology</i> , 2016, 36, 1194-1205.	1.1	20
523	Mapping regulatory elements. <i>Nature Biotechnology</i> , 2016, 34, 151-152.	9.4	5
524	Hypoxia as a therapy for mitochondrial disease. <i>Science</i> , 2016, 352, 54-61.	6.0	339
525	New Transformation Technologies for Trees. <i>Forestry Sciences</i> , 2016, , 31-66.	0.4	2
526	Targeted Gene Manipulation in Plants Using the CRISPR/Cas Technology. <i>Journal of Genetics and Genomics</i> , 2016, 43, 251-262.	1.7	57
527	Cas-Database: web-based genome-wide guide RNA library design for gene knockout screens using CRISPR-Cas9. <i>Bioinformatics</i> , 2016, 32, 2017-2023.	1.8	46
528	Functional Genomic Strategies for Elucidating Human-Virus Interactions. <i>Advances in Virus Research</i> , 2016, 94, 1-51.	0.9	27
529	Chemical Biology Approaches to Genome Editing: Understanding, Controlling, and Delivering Programmable Nucleases. <i>Cell Chemical Biology</i> , 2016, 23, 57-73.	2.5	42

#	ARTICLE	IF	CITATIONS
530	Large-Scale Single Guide RNA Library Construction and Use for CRISPR-Cas9-Based Genetic Screens. Cold Spring Harbor Protocols, 2016, 2016, pdb.top086892.	0.2	20
531	Recent advances in quantitative high throughput and high content data analysis. Expert Opinion on Drug Discovery, 2016, 11, 415-423.	2.5	7
532	Kinetics of the CRISPR-Cas9 effector complex assembly and the role of 3'-terminal segment of guide RNA. Nucleic Acids Research, 2016, 44, 2837-2845.	6.5	71
533	Biosafety of Forest Transgenic Trees. Forestry Sciences, 2016, , .	0.4	6
534	Targeted candidate gene screens using CRISPR/Cas9 technology. Methods in Cell Biology, 2016, 135, 89-106.	0.5	23
535	CRISPR Interference Efficiently Induces Specific and Reversible Gene Silencing in Human iPSCs. Cell Stem Cell, 2016, 18, 541-553.	5.2	418
536	Quantitative CRISPR interference screens in yeast identify chemical-genetic interactions and new rules for guide RNA design. Genome Biology, 2016, 17, 45.	3.8	165
537	CRISPR-Based Methods for <i>Caenorhabditis elegans</i> Genome Engineering. Genetics, 2016, 202, 885-901.	1.2	258
538	Advances in identification and validation of protein targets of natural products without chemical modification. Natural Product Reports, 2016, 33, 719-730.	5.2	96
539	The Development and Use of Zinc-Finger Nucleases. Advances in Experimental Medicine and Biology, 2016, , 15-28.	0.8	2
540	Essential role of protein kinase R antagonism by TRS1 in human cytomegalovirus replication. Virology, 2016, 489, 75-85.	1.1	21
541	Applications of genome editing in insects. Current Opinion in Insect Science, 2016, 13, 43-54.	2.2	58
542	Functional genetic screens for enhancer elements in the human genome using CRISPR-Cas9. Nature Biotechnology, 2016, 34, 192-198.	9.4	352
543	CRISPR Technology for Genome Activation and Repression in Mammalian Cells. Cold Spring Harbor Protocols, 2016, 2016, pdb.prot090175.	0.2	20
544	CRISPR/Cas9 DNA cleavage at SNP-derived PAM enables both in vitro and in vivo KRT12 mutation-specific targeting. Gene Therapy, 2016, 23, 108-112.	2.3	107
545	Creating and evaluating accurate CRISPR-Cas9 scalpels for genomic surgery. Nature Methods, 2016, 13, 41-50.	9.0	99
546	A Genome-wide CRISPR (Clustered Regularly Interspaced Short Palindromic Repeats) Screen Identifies NEK7 as an Essential Component of NLRP3 Inflammasome Activation. Journal of Biological Chemistry, 2016, 291, 103-109.	1.6	359
547	LMO2 Oncoprotein Stability in T-Cell Leukemia Requires Direct LDB1 Binding. Molecular and Cellular Biology, 2016, 36, 488-506.	1.1	9

#	ARTICLE	IF	CITATIONS
548	caRools: an R package for exploratory data analysis and documentation of pooled CRISPR/Cas9 screens. <i>Bioinformatics</i> , 2016, 32, 632-634.	1.8	54
549	Controlling transcription in human pluripotent stem cells using CRISPR-effectors. <i>Methods</i> , 2016, 101, 36-42.	1.9	15
550	Efficient genomic correction methods in human iPS cells using CRISPR-Cas9 system. <i>Methods</i> , 2016, 101, 27-35.	1.9	54
551	Application of genome editing technologies to the study and treatment of hematological disease. <i>Advances in Biological Regulation</i> , 2016, 60, 122-134.	1.4	14
552	Genetic screening reveals a link between Wnt signaling and antitubulin drugs. <i>Pharmacogenomics Journal</i> , 2016, 16, 164-172.	0.9	9
553	Application of CRISPR-mediated genome engineering in cancer research. <i>Cancer Letters</i> , 2017, 387, 10-17.	3.2	16
554	The applications of CRISPR screen in functional genomics. <i>Briefings in Functional Genomics</i> , 2017, 16, 34-37.	1.3	7
555	Applications of the CRISPR/Cas9 system in murine cancer modeling. <i>Briefings in Functional Genomics</i> , 2017, 16, 25-33.	1.3	12
556	Genome-scale CRISPR pooled screens. <i>Analytical Biochemistry</i> , 2017, 532, 95-99.	1.1	52
557	Studying human disease using human neurons. <i>Brain Research</i> , 2017, 1656, 40-48.	1.1	21
558	Genome engineering of stem cell organoids for disease modeling. <i>Protein and Cell</i> , 2017, 8, 315-327.	4.8	30
559	Fully Automated One-Step Synthesis of Single-Transcript TALEN Pairs Using a Biological Foundry. <i>ACS Synthetic Biology</i> , 2017, 6, 678-685.	1.9	46
560	Synthetic lethality: emerging targets and opportunities in melanoma. <i>Pigment Cell and Melanoma Research</i> , 2017, 30, 183-193.	1.5	12
561	The application of CRISPR technology to high content screening in primary neurons. <i>Molecular and Cellular Neurosciences</i> , 2017, 80, 170-179.	1.0	15
562	An Argonaute phosphorylation cycle promotes microRNA-mediated silencing. <i>Nature</i> , 2017, 542, 197-202.	13.7	232
563	Scarless Cas9 Assisted Recombineering (noâ€SCAR) in <i>Escherichia coli</i> , an Easy-to-Use System for Genome Editing. <i>Current Protocols in Molecular Biology</i> , 2017, 117, 31.8.1-31.8.20.	2.9	42
564	Cas9, Cpf1 and C2c1/2/3-What's next?. <i>Bioengineered</i> , 2017, 8, 265-273.	1.4	80
565	Gene Essentiality Profiling Reveals Gene Networks and Synthetic Lethal Interactions with Oncogenic Ras. <i>Cell</i> , 2017, 168, 890-903.e15.	13.5	535

#	ARTICLE	IF	CITATIONS
566	The Pseudouridine Synthase RPUSD4 Is an Essential Component of Mitochondrial RNA Granules. <i>Journal of Biological Chemistry</i> , 2017, 292, 4519-4532.	1.6	79
567	Painting a specific chromosome with CRISPR/Cas9 for live-cell imaging. <i>Cell Research</i> , 2017, 27, 298-301.	5.7	53
568	Context-dependent role for chromatin remodeling component PBRM1/BAF180 in clear cell renal cell carcinoma. <i>Oncogenesis</i> , 2017, 6, e287-e287.	2.1	28
569	Application of the <sc>CRISPR</sc> gene editing technique in insect functional genome studies – a review. <i>Entomologia Experimentalis Et Applicata</i> , 2017, 162, 124-132.	0.7	20
570	Decoding transcriptional states in cancer. <i>Current Opinion in Genetics and Development</i> , 2017, 43, 82-92.	1.5	7
571	CRISPR/Cas9-Induced (CTGâ…CAG) n Repeat Instability in the Myotonic Dystrophy Type 1 Locus: Implications for Therapeutic Genome Editing. <i>Molecular Therapy</i> , 2017, 25, 24-43.	3.7	108
572	Genome-Scale Networks Link Neurodegenerative Disease Genes to Î±-Synuclein through Specific Molecular Pathways. <i>Cell Systems</i> , 2017, 4, 157-170.e14.	2.9	102
573	Strain Development by Whole-Cell Directed Evolution. , 2017, , 173-200.		2
574	Correction of the Exon 2 Duplication in DMD Myoblasts by a Single CRISPR/Cas9 System. <i>Molecular Therapy - Nucleic Acids</i> , 2017, 7, 11-19.	2.3	44
575	Rapid Construction of Multiplexed CRISPR-Cas9 Systems for Plant Genome Editing. <i>Methods in Molecular Biology</i> , 2017, 1578, 291-307.	0.4	15
576	A Scalable Epitope Tagging Approach for High Throughput ChIP-Seq Analysis. <i>ACS Synthetic Biology</i> , 2017, 6, 1034-1042.	1.9	19
577	Rapid and tunable method to temporally control gene editing based on conditional Cas9 stabilization. <i>Nature Communications</i> , 2017, 8, 14370.	5.8	128
578	A stable but reversible integrated surrogate reporter for assaying CRISPR/Cas9-stimulated homology-directed repair. <i>Journal of Biological Chemistry</i> , 2017, 292, 6148-6162.	1.6	13
579	A Systematic Evaluation of Methods for Tailoring Genome-Scale Metabolic Models. <i>Cell Systems</i> , 2017, 4, 318-329.e6.	2.9	178
580	Method for Dual Viral Vector Mediated CRISPR-Cas9 Gene Disruption in Primary Human Endothelial Cells. <i>Scientific Reports</i> , 2017, 7, 42127.	1.6	23
581	Identification of a novel NAMPT inhibitor by CRISPR/Cas9 chemogenomic profiling in mammalian cells. <i>Scientific Reports</i> , 2017, 7, 42728.	1.6	36
582	Large-Scale Analysis of CRISPR/Cas9 Cell-Cycle Knockouts Reveals the Diversity of p53-Dependent Responses to Cell-Cycle Defects. <i>Developmental Cell</i> , 2017, 40, 405-420.e2.	3.1	175
583	Predictability of Genetic Interactions from Functional Gene Modules. <i>G3: Genes, Genomes, Genetics</i> , 2017, 7, 617-624.	0.8	8

#	ARTICLE	IF	CITATIONS
584	High-throughput in situ cell electroporation microsystem for parallel delivery of single guide RNAs into mammalian cells. <i>Scientific Reports</i> , 2017, 7, 42512.	1.6	31
585	Cas9-mediated genome editing in the methanogenic archaeon <i>Methanosarcina acetivorans</i> . <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017, 114, 2976-2981.	3.3	107
586	Loss of Pin1 Suppresses Hedgehog-Driven Medulloblastoma Tumorigenesis. <i>Neoplasia</i> , 2017, 19, 216-225.	2.3	7
587	Integration of metabolic, regulatory and signaling networks towards analysis of perturbation and dynamic responses. <i>Current Opinion in Systems Biology</i> , 2017, 2, 59-66.	1.3	13
588	Application of CRISPR/Cas9 to Autophagy Research. <i>Methods in Enzymology</i> , 2017, 588, 79-108.	0.4	27
589	Anti-trypanosomatid drug discovery: an ongoing challenge and a continuing need. <i>Nature Reviews Microbiology</i> , 2017, 15, 217-231.	13.6	315
590	Systematic Identification of Genes Regulating Muscle Stem Cell Self-Renewal and Differentiation. <i>Methods in Molecular Biology</i> , 2017, 1556, 343-353.	0.4	5
591	What rheumatologists need to know about CRISPR/Cas9. <i>Nature Reviews Rheumatology</i> , 2017, 13, 205-216.	3.5	18
592	Gene Editing With CRISPR/Cas9 RNA-Directed Nuclease. <i>Circulation Research</i> , 2017, 120, 876-894.	2.0	61
593	Cancer Gene Discovery in Hepatocellular Carcinoma: The CRISPR/CAS9 Accelerator. <i>Gastroenterology</i> , 2017, 152, 941-943.	0.6	3
594	GuideScan software for improved single and paired CRISPR guide RNA design. <i>Nature Biotechnology</i> , 2017, 35, 347-349.	9.4	205
595	Clustered, Regularly Interspaced Short Palindromic Repeats (CRISPR)/Cas9-coupled Affinity Purification/Mass Spectrometry Analysis Revealed a Novel Role of Neurofibromin in mTOR Signaling. <i>Molecular and Cellular Proteomics</i> , 2017, 16, 594-607.	2.5	13
596	PNPLA5-knockout rats induced by CRISPR/Cas9 exhibit abnormal bleeding and lipid level. <i>Journal of Integrative Agriculture</i> , 2017, 16, 169-180.	1.7	7
597	Directed Enzyme Evolution: Advances and Applications. , 2017, , .		18
598	Single-minded CRISPR screening. <i>Nature Biotechnology</i> , 2017, 35, 339-340.	9.4	4
599	A functional screening of the kinome identifies the Polo-like kinase 4 as a potential therapeutic target for malignant rhabdoid tumors, and possibly, other embryonal tumors of the brain. <i>Pediatric Blood and Cancer</i> , 2017, 64, e26551.	0.8	23
600	CRISPR/Cas9: Transcending the Reality of Genome Editing. <i>Molecular Therapy - Nucleic Acids</i> , 2017, 7, 211-222.	2.3	81
601	Enhancing the throughput and multiplexing capabilities of next generation sequencing for efficient implementation of pooled shRNA and CRISPR screens. <i>Scientific Reports</i> , 2017, 7, 1040.	1.6	4

#	ARTICLE	IF	CITATIONS
602	Marker-free coselection for CRISPR-driven genome editing in human cells. <i>Nature Methods</i> , 2017, 14, 615-620.	9.0	139
603	A CRISPR toolbox to study virus-host interactions. <i>Nature Reviews Microbiology</i> , 2017, 15, 351-364.	13.6	147
604	Elucidating and engineering thiopeptide biosynthesis. <i>World Journal of Microbiology and Biotechnology</i> , 2017, 33, 119.	1.7	10
605	Single-cell CRISPR screening in drug resistance. <i>Cell Biology and Toxicology</i> , 2017, 33, 207-210.	2.4	35
606	mTORC1-independent autophagy regulates receptor tyrosine kinase phosphorylation in colorectal cancer cells via an mTORC2-mediated mechanism. <i>Cell Death and Differentiation</i> , 2017, 24, 1045-1062.	5.0	55
607	Use of CRISPR/Cas9 for Symbiotic Nitrogen Fixation Research in Legumes. <i>Progress in Molecular Biology and Translational Science</i> , 2017, 149, 187-213.	0.9	24
608	Elucidating drug targets and mechanisms of action by genetic screens in mammalian cells. <i>Chemical Communications</i> , 2017, 53, 7162-7167.	2.2	26
609	CRISPR Editing in Biological and Biomedical Investigation. <i>Journal of Cellular Biochemistry</i> , 2017, 118, 4152-4162.	1.2	6
610	Automated multiplex genome-scale engineering in yeast. <i>Nature Communications</i> , 2017, 8, 15187.	5.8	162
611	Genome-scale measurement of off-target activity using Cas9 toxicity in high-throughput screens. <i>Nature Communications</i> , 2017, 8, 15178.	5.8	284
612	High-content analysis screening for cell cycle regulators using arrayed synthetic crRNA libraries. <i>Journal of Biotechnology</i> , 2017, 251, 189-200.	1.9	25
613	CRISPR/Cas9-mediated gene knockout screens and target identification via whole-genome sequencing uncover host genes required for picornavirus infection. <i>Journal of Biological Chemistry</i> , 2017, 292, 10664-10671.	1.6	33
614	A systematic evaluation of nucleotide properties for CRISPR sgRNA design. <i>BMC Bioinformatics</i> , 2017, 18, 297.	1.2	29
615	Developmental history and application of CRISPR in human disease. <i>Journal of Gene Medicine</i> , 2017, 19, e2963.	1.4	9
616	CRISPR-STOP: gene silencing through base-editing-induced nonsense mutations. <i>Nature Methods</i> , 2017, 14, 710-712.	9.0	290
617	Bromodomain Protein BRD4 Is a Transcriptional Repressor of Autophagy and Lysosomal Function. <i>Molecular Cell</i> , 2017, 66, 517-532.e9.	4.5	196
618	A platform for functional assessment of large variant libraries in mammalian cells. <i>Nucleic Acids Research</i> , 2017, 45, e102-e102.	6.5	80
619	Disruptive non-disruptive applications of CRISPR/Cas9. <i>Current Opinion in Biotechnology</i> , 2017, 48, 203-209.	3.3	7

#	ARTICLE	IF	CITATIONS
620	Phenotype databases for genetic screens in human cells. <i>Journal of Biotechnology</i> , 2017, 261, 63-69.	1.9	10
621	Genome-wide Targeted Mutagenesis in Rice Using the CRISPR/Cas9 System. <i>Molecular Plant</i> , 2017, 10, 1242-1245.	3.9	242
622	CRISPRcloud: a secure cloud-based pipeline for CRISPR pooled screen deconvolution. <i>Bioinformatics</i> , 2017, 33, 2963-2965.	1.8	22
623	Mammalian Synthetic Biology: Engineering Biological Systems. <i>Annual Review of Biomedical Engineering</i> , 2017, 19, 249-277.	5.7	47
624	High-Throughput Characterization of Cascade type I-E CRISPR Guide Efficacy Reveals Unexpected PAM Diversity and Target Sequence Preferences. <i>Genetics</i> , 2017, 206, 1727-1738.	1.2	23
625	CRISPR/Cas9-Based Genome Editing for Disease Modeling and Therapy: Challenges and Opportunities for Nonviral Delivery. <i>Chemical Reviews</i> , 2017, 117, 9874-9906.	23.0	418
626	Generating conditional gene knockouts in <i>Plasmodium</i> – a toolkit to produce stable DiCre recombinase-expressing parasite lines using CRISPR/Cas9. <i>Scientific Reports</i> , 2017, 7, 3881.	1.6	139
627	Generation of a Collection of Mutant Tomato Lines Using Pooled CRISPR Libraries. <i>Plant Physiology</i> , 2017, 174, 2023-2037.	2.3	112
628	Progress and Application of CRISPR/Cas Technology in Biological and Biomedical Investigation. <i>Journal of Cellular Biochemistry</i> , 2017, 118, 3061-3071.	1.2	10
629	Deletion of a target gene in <i>Indica</i> rice via CRISPR/Cas9. <i>Plant Cell Reports</i> , 2017, 36, 1333-1343.	2.8	52
630	An efficient method to generate conditional knockout cell lines for essential genes by combination of auxin-inducible degron tag and CRISPR/Cas9. <i>Chromosome Research</i> , 2017, 25, 253-260.	1.0	26
631	Promise of adeno-associated virus as a gene therapy vector for cardiovascular diseases. <i>Heart Failure Reviews</i> , 2017, 22, 795-823.	1.7	7
632	Hyperactivation of HUSH complex function by Charcot-Marie-Tooth disease mutation in MORC2. <i>Nature Genetics</i> , 2017, 49, 1035-1044.	9.4	105
633	Optimizing complex phenotypes through model-guided multiplex genome engineering. <i>Genome Biology</i> , 2017, 18, 100.	3.8	23
634	Emerging technologies for prediction of drug candidate efficacy in the preclinical pipeline. <i>Drug Discovery Today</i> , 2017, 22, 1598-1603.	3.2	17
635	Therapeutic editing of hepatocyte genome in vivo. <i>Journal of Hepatology</i> , 2017, 67, 818-828.	1.8	17
636	Complementary information derived from CRISPR Cas9 mediated gene deletion and suppression. <i>Nature Communications</i> , 2017, 8, 15403.	5.8	93
637	A quantitative and multiplexed approach to uncover the fitness landscape of tumor suppression in vivo. <i>Nature Methods</i> , 2017, 14, 737-742.	9.0	105

#	ARTICLE	IF	CITATIONS
638	Genome-wide CRISPR screen identifies HNRNPL as a prostate cancer dependency regulating RNA splicing. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017, 114, E5207-E5215.	3.3	266
639	ERF mutations reveal a balance of ETS factors controlling prostate oncogenesis. <i>Nature</i> , 2017, 546, 671-675.	13.7	70
640	Use of mariner transposases for one-step delivery and integration of DNA in prokaryotes and eukaryotes by transfection. <i>Nucleic Acids Research</i> , 2017, 45, e89-e89.	6.5	8
641	CRISPR-Cas9 epigenome editing enables high-throughput screening for functional regulatory elements in the human genome. <i>Nature Biotechnology</i> , 2017, 35, 561-568.	9.4	362
642	Genome-scale CRISPR-Cas9 knockout and transcriptional activation screening. <i>Nature Protocols</i> , 2017, 12, 828-863.	5.5	858
643	CRISPR/Cas 9 genome editing and its applications in organoids. <i>American Journal of Physiology - Renal Physiology</i> , 2017, 312, G257-G265.	1.6	105
644	Evaluation and rational design of guide RNAs for efficient CRISPR/Cas9-mediated mutagenesis in <i>Ciona</i> . <i>Developmental Biology</i> , 2017, 425, 8-20.	0.9	69
645	Functional variomics and network perturbation: connecting genotype to phenotype in cancer. <i>Nature Reviews Genetics</i> , 2017, 18, 395-410.	7.7	84
647	Applications of CRISPR genome editing technology in drug target identification and validation. <i>Expert Opinion on Drug Discovery</i> , 2017, 12, 541-552.	2.5	15
648	Marker Recycling in <i>Candida albicans</i> through CRISPR-Cas9-Induced Marker Excision. <i>MSphere</i> , 2017, 2, .	1.3	43
649	Genome Editing in Human Pluripotent Stem Cells. <i>Methods in Molecular Biology</i> , 2017, 1590, 165-174.	0.4	4
650	Explicit Modeling of siRNA-Dependent On- and Off-Target Repression Improves the Interpretation of Screening Results. <i>Cell Systems</i> , 2017, 4, 182-193.e4.	2.9	22
651	Functional interrogation of non-coding DNA through CRISPR genome editing. <i>Methods</i> , 2017, 121-122, 118-129.	1.9	28
652	Live cell imaging of low- and non-repetitive chromosome loci using CRISPR-Cas9. <i>Nature Communications</i> , 2017, 8, 14725.	5.8	199
653	Selective Killing of SMARCA2- and SMARCA4-deficient Small Cell Carcinoma of the Ovary, Hypercalcemic Type Cells by Inhibition of EZH2: <i>In Vitro</i> and <i>In Vivo</i> Preclinical Models. <i>Molecular Cancer Therapeutics</i> , 2017, 16, 850-860.	1.9	134
654	Guide Picker is a comprehensive design tool for visualizing and selecting guides for CRISPR experiments. <i>BMC Bioinformatics</i> , 2017, 18, 167.	1.2	23
655	Editing the genome of hiPSC with CRISPR/Cas9: disease models. <i>Mammalian Genome</i> , 2017, 28, 348-364.	1.0	72
656	CRISPR/Cas9-mediated genome editing in plants. <i>Methods</i> , 2017, 121-122, 94-102.	1.9	46

#	ARTICLE	IF	CITATIONS
657	Potential of long non-coding RNAs in cancer patients: From biomarkers to therapeutic targets. <i>International Journal of Cancer</i> , 2017, 140, 1955-1967.	2.3	417
658	Genome engineering in human pluripotent stem cells. <i>Current Opinion in Chemical Engineering</i> , 2017, 15, 56-67.	3.8	1
659	Genome-Wide CRISPR Screen Identifies Regulators of Mitogen-Activated Protein Kinase as Suppressors of Liver Tumors in Mice. <i>Gastroenterology</i> , 2017, 152, 1161-1173.e1.	0.6	97
660	Genome-wide mapping of mutations at single-nucleotide resolution for protein, metabolic and genome engineering. <i>Nature Biotechnology</i> , 2017, 35, 48-55.	9.4	298
661	A Precise Genome Editing Method Reveals Insights into the Activity of Eukaryotic Promoters. <i>Cell Reports</i> , 2017, 18, 275-286.	2.9	9
662	A genome-wide CRISPR screen identifies a restricted set of HIV host dependency factors. <i>Nature Genetics</i> , 2017, 49, 193-203.	9.4	290
663	In vivo high-throughput profiling of CRISPR-Cpf1 activity. <i>Nature Methods</i> , 2017, 14, 153-159.	9.0	305
664	CRISPRi-based genome-scale identification of functional long noncoding RNA loci in human cells. <i>Science</i> , 2017, 355, .	6.0	566
665	Targeted genome editing in a quail cell line using a customized CRISPR/Cas9 system. <i>Poultry Science</i> , 2017, 96, 1445-1450.	1.5	16
666	Decoding the role of regulatory element polymorphisms in complex disease. <i>Current Opinion in Genetics and Development</i> , 2017, 43, 38-45.	1.5	30
667	Chromatin-Bound Oxidized α -Synuclein Causes Strand Breaks in Neuronal Genomes in in vitro Models of Parkinson's Disease. <i>Journal of Alzheimer's Disease</i> , 2017, 60, S133-S150.	1.2	62
668	Gene delivery ability of polyethylenimine and polyethylene glycol dual-functionalized nanographene oxide in 11 different cell lines. <i>Royal Society Open Science</i> , 2017, 4, 170822.	1.1	16
669	Lipid nanoparticle-mediated efficient delivery of CRISPR/Cas9 for tumor therapy. <i>NPG Asia Materials</i> , 2017, 9, e441-e441.	3.8	132
670	Key elements for designing and performing a CRISPR/Cas9-based genetic screen. <i>Journal of Genetics and Genomics</i> , 2017, 44, 439-449.	1.7	16
671	Systematic analysis of human telomeric dysfunction using inducible telosome/shelterin CRISPR/Cas9 knockout cells. <i>Cell Discovery</i> , 2017, 3, 17034.	3.1	43
672	Genome engineering: a new approach to gene therapy for neuromuscular disorders. <i>Nature Reviews Neurology</i> , 2017, 13, 647-661.	4.9	68
673	CRISPR Genome-Wide Screening Identifies Dependence on the Proteasome Subunit PSMC6 for Bortezomib Sensitivity in Multiple Myeloma. <i>Molecular Cancer Therapeutics</i> , 2017, 16, 2862-2870.	1.9	54
674	Tissue-specific genome editing of laminA/C in the posterior silk glands of <i>Bombyx mori</i> . <i>Journal of Genetics and Genomics</i> , 2017, 44, 451-459.	1.7	19

#	ARTICLE	IF	CITATIONS
675	Molecular tools for gene manipulation in filamentous fungi. <i>Applied Microbiology and Biotechnology</i> , 2017, 101, 8063-8075.	1.7	54
676	Genetic and Functional Drivers of Diffuse Large B-Cell Lymphoma. <i>Cell</i> , 2017, 171, 481-494.e15.	13.5	804
677	High-Throughput Approaches to Pinpoint Function within the Noncoding Genome. <i>Molecular Cell</i> , 2017, 68, 44-59.	4.5	54
678	Methods and Applications of CRISPR-Mediated Base Editing in Eukaryotic Genomes. <i>Molecular Cell</i> , 2017, 68, 26-43.	4.5	199
679	CRISPR/Cas9-Based Engineering of the Epigenome. <i>Cell Stem Cell</i> , 2017, 21, 431-447.	5.2	215
680	Identifying host regulators and inhibitors of liver stage malaria infection using kinase activity profiles. <i>Nature Communications</i> , 2017, 8, 1232.	5.8	33
681	CRISPR/Cas9 Genome-Editing System in Human Stem Cells: Current Status and Future Prospects. <i>Molecular Therapy - Nucleic Acids</i> , 2017, 9, 230-241.	2.3	82
682	Randomized CRISPR-Cas Transcriptional Perturbation Screening Reveals Protective Genes against Alpha-Synuclein Toxicity. <i>Molecular Cell</i> , 2017, 68, 247-257.e5.	4.5	31
683	CRISPR/Cas9 screening using unique molecular identifiers. <i>Molecular Systems Biology</i> , 2017, 13, 945.	3.2	51
684	Combined CRISPRi/a-Based Chemical Genetic Screens Reveal that Rigosertib Is a Microtubule-Destabilizing Agent. <i>Molecular Cell</i> , 2017, 68, 210-223.e6.	4.5	197
685	Efficient inhibition of duck hepatitis B virus DNA by the CRISPR/Cas9 system. <i>Molecular Medicine Reports</i> , 2017, 16, 7199-7204.	1.1	15
686	Sparks of the CRISPR explosion: Applications in medicine and agriculture. <i>Journal of Genetics and Genomics</i> , 2017, 44, 413-414.	1.7	5
687	CRISPR-UMI: single-cell lineage tracing of pooled CRISPR-Cas9 screens. <i>Nature Methods</i> , 2017, 14, 1191-1197.	9.0	95
688	CRISPR/Cas9-mediated gene knockout is insensitive to target copy number but is dependent on guide RNA potency and Cas9/sgRNA threshold expression level. <i>Nucleic Acids Research</i> , 2017, 45, 12039-12053.	6.5	64
689	A CRISPR screen identifies a pathway required for paraquat-induced cell death. <i>Nature Chemical Biology</i> , 2017, 13, 1274-1279.	3.9	138
690	CRISPR/CAS9, the king of genome editing tools. <i>Molecular Biology</i> , 2017, 51, 514-525.	0.4	18
691	Human genetic variation in <i>VAC14</i> regulates <i>Salmonella</i> invasion and typhoid fever through modulation of cholesterol. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017, 114, E7746-E7755.	3.3	46
692	Managing the SOS Response for Enhanced CRISPR-Cas-Based Recombineering in <i>E. coli</i> through Transient Inhibition of Host RecA Activity. <i>ACS Synthetic Biology</i> , 2017, 6, 2209-2218.	1.9	41

#	ARTICLE	IF	CITATIONS
693	Parkin-Independent Mitophagy Controls Chemotherapeutic Response in Cancer Cells. <i>Cell Reports</i> , 2017, 20, 2846-2859.	2.9	217
694	Genome Editing for Cancer Therapy: Delivery of Cas9 Protein/sgRNA Plasmid via a Gold Nanocluster/Lipid Coreâ€“Shell Nanocarrier. <i>Advanced Science</i> , 2017, 4, 1700175.	5.6	166
695	Genome Engineering for Personalized Arthritis Therapeutics. <i>Trends in Molecular Medicine</i> , 2017, 23, 917-931.	3.5	54
696	Genome and metabolic engineering in non-conventional yeasts: Current advances and applications. <i>Synthetic and Systems Biotechnology</i> , 2017, 2, 198-207.	1.8	105
697	Delivery strategies of the CRISPR-Cas9 gene-editing system for therapeutic applications. <i>Journal of Controlled Release</i> , 2017, 266, 17-26.	4.8	376
698	RABIF/MSS4 is a Rab-stabilizing holdase chaperone required for GLUT4 exocytosis. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017, 114, E8224-E8233.	3.3	52
699	miR-130a Deregulates PTEN and Stimulates Tumor Growth. <i>Cancer Research</i> , 2017, 77, 6168-6178.	0.4	50
700	Systems-level interference strategies to decipher host factors involved in bacterial pathogen interaction: from RNAi to CRISPRi. <i>Current Opinion in Microbiology</i> , 2017, 39, 34-41.	2.3	10
701	Smac mimetics and oncolytic viruses synergize in driving anticancer T-cell responses through complementary mechanisms. <i>Nature Communications</i> , 2017, 8, 344.	5.8	61
702	Autophagy-Independent Lysosomal Targeting Regulated by ULK1/2-FIP200 and ATG9. <i>Cell Reports</i> , 2017, 20, 2341-2356.	2.9	126
703	CRISPR/Cas9-mediated genome editing efficiently creates specific mutations at multiple loci using one sgRNA in <i>Brassica napus</i> . <i>Scientific Reports</i> , 2017, 7, 7489.	1.6	164
704	High-Throughput Imaging for the Discovery of Cellular Mechanisms of Disease. <i>Trends in Genetics</i> , 2017, 33, 604-615.	2.9	87
705	CRISPR/Cas9 Technologyâ€“Based Xenograft Tumors as Candidate Reference Materials for Multiple EML4-ALK Rearrangements Testing. <i>Journal of Molecular Diagnostics</i> , 2017, 19, 766-775.	1.2	8
706	A Landscape of Therapeutic Cooperativity in KRAS Mutant Cancers Reveals Principles for Controlling Tumor Evolution. <i>Cell Reports</i> , 2017, 20, 999-1015.	2.9	77
707	CRISPR/Cas9-Mediated Scanning for Regulatory Elements Required for HPRT1 Expression via Thousands of Large, Programmed Genomic Deletions. <i>American Journal of Human Genetics</i> , 2017, 101, 192-205.	2.6	133
708	Spatial cycles mediated by UNC119 solubilisation maintain Src family kinases plasma membrane localisation. <i>Nature Communications</i> , 2017, 8, 114.	5.8	27
709	A CRISPR/Cas9 guidance RNA screen platform for HIV provirus disruption and HIV/AIDS gene therapy in astrocytes. <i>Scientific Reports</i> , 2017, 7, 5955.	1.6	20
710	Blockage of Core Fucosylation Reduces Cell-Surface Expression of PD-1 and Promotes Anti-tumor Immune Responses of T Cells. <i>Cell Reports</i> , 2017, 20, 1017-1028.	2.9	156

#	ARTICLE	IF	CITATIONS
711	Transcriptome modeling and phenotypic assays for cancer precision medicine. Archives of Pharmacal Research, 2017, 40, 906-914.	2.7	7
712	Genome editing in crop improvement: Present scenario and future prospects. Journal of Crop Improvement, 2017, 31, 453-559.	0.9	57
713	Identification of essential genes for cancer immunotherapy. Nature, 2017, 548, 537-542.	13.7	668
714	Optimised metrics for CRISPR-KO screens with second-generation gRNA libraries. Scientific Reports, 2017, 7, 7384.	1.6	37
715	CRISPR-Cas9-mediated functional dissection of 3'-UTRs. Nucleic Acids Research, 2017, 45, 10800-10810.	6.5	39
716	Targeted genome editing in <i>Caenorhabditis elegans</i> using CRISPR/Cas9. Wiley Interdisciplinary Reviews: Developmental Biology, 2017, 6, e287.	5.9	15
717	Genome-Wide CRISPR/Cas9 Screening for High-Throughput Functional Genomics in Human Cells. Methods in Molecular Biology, 2017, 1656, 175-181.	0.4	15
719	Mapping a diversity of genetic interactions in yeast. Current Opinion in Systems Biology, 2017, 6, 14-21.	1.3	20
720	AAV-mediated direct in vivo CRISPR screen identifies functional suppressors in glioblastoma. Nature Neuroscience, 2017, 20, 1329-1341.	7.1	179
721	Human genetic variation alters CRISPR-Cas9 on- and off-targeting specificity at therapeutically implicated loci. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, E11257-E11266.	3.3	96
722	Emerging Role of CRISPR/Cas9 Technology for MicroRNAs Editing in Cancer Research. Cancer Research, 2017, 77, 6812-6817.	0.4	56
723	Genome Editing. Journal of the American College of Cardiology, 2017, 70, 2808-2821.	1.2	27
724	Conditional Degrons for Controlling Protein Expression at the Protein Level. Annual Review of Genetics, 2017, 51, 83-102.	3.2	100
725	CRISPR-Cas9 for Drug Discovery in Oncology. Annual Reports in Medicinal Chemistry, 2017, , 61-85.	0.5	2
726	Precision Medicine, CRISPR, and Genome Engineering. Advances in Experimental Medicine and Biology, 2017, , .	0.8	2
727	Advancing towards a global mammalian gene regulation model through single-cell analysis and synthetic biology. Current Opinion in Biomedical Engineering, 2017, 4, 174-193.	1.8	7
728	From Reductionism to Holism: Toward a More Complete View of Development Through Genome Engineering. Advances in Experimental Medicine and Biology, 2017, 1016, 45-74.	0.8	7
729	A Transgenic Core Facility's Experience in Genome Editing Revolution. Advances in Experimental Medicine and Biology, 2017, 1016, 75-90.	0.8	23

#	ARTICLE	IF	CITATIONS
730	Target Discovery for Precision Medicine Using High-Throughput Genome Engineering. <i>Advances in Experimental Medicine and Biology</i> , 2017, 1016, 123-145.	0.8	6
731	Optimization of CRISPR/Cas9 genome editing for loss-of-function in the early chick embryo. <i>Developmental Biology</i> , 2017, 432, 86-97.	0.9	59
732	Direction of leukocyte polarization and migration by the phosphoinositide-transfer protein TIPE2. <i>Nature Immunology</i> , 2017, 18, 1353-1360.	7.0	39
733	InÂVivo Knockout of the Vegfa Gene by Lentiviral Delivery of CRISPR/Cas9 in Mouse Retinal Pigment Epithelium Cells. <i>Molecular Therapy - Nucleic Acids</i> , 2017, 9, 89-99.	2.3	61
734	Role of Host Genes in Influenza Virus Replication. <i>Current Topics in Microbiology and Immunology</i> , 2017, 419, 151-189.	0.7	22
735	Identifying synthetic lethal targets using CRISPR/Cas9 system. <i>Methods</i> , 2017, 131, 66-73.	1.9	24
736	Enabling Graded and Large-Scale Multiplex of Desired Genes Using a Dual-Mode dCas9 Activator in <i>Saccharomyces cerevisiae</i> . <i>ACS Synthetic Biology</i> , 2017, 6, 1931-1943.	1.9	53
737	Type II CRISPR/Cas9 approach in the oncological therapy. <i>Journal of Experimental and Clinical Cancer Research</i> , 2017, 36, 80.	3.5	17
738	Host determinants of adeno-associated viral vector entry. <i>Current Opinion in Virology</i> , 2017, 24, 124-131.	2.6	67
739	A convenient method to pre-screen candidate guide RNAs for CRISPR/Cas9 gene editing by NHEJ-mediated integration of a self-cleaving GFP-expression plasmid. <i>DNA Research</i> , 2017, 24, 609-621.	1.5	21
740	Next-generation mammalian genetics toward organism-level systems biology. <i>Npj Systems Biology and Applications</i> , 2017, 3, 15.	1.4	16
741	The applications and advances of CRISPR-Cas9 in medical research. <i>Briefings in Functional Genomics</i> , 2017, 16, 1-3.	1.3	0
742	Forward RNAi Screens in Human Hematopoietic Stem Cells. <i>Methods in Molecular Biology</i> , 2017, 1622, 29-50.	0.4	4
743	Challenges and emerging directions in single-cell analysis. <i>Genome Biology</i> , 2017, 18, 84.	3.8	258
744	Seed-effect modeling improves the consistency of genome-wide loss-of-function screens and identifies synthetic lethal vulnerabilities in cancer cells. <i>Genome Medicine</i> , 2017, 9, 51.	3.6	12
745	Evaluation and Design of Genome-Wide CRISPR/SpCas9 Knockout Screens. <i>G3: Genes, Genomes, Genetics</i> , 2017, 7, 2719-2727.	0.8	417
746	Loss-of-function genetic tools for animal models: cross-species and cross-platform differences. <i>Nature Reviews Genetics</i> , 2017, 18, 24-40.	7.7	159
747	GenomeCRISPR - a database for high-throughput CRISPR/Cas9 screens. <i>Nucleic Acids Research</i> , 2017, 45, D679-D686.	6.5	65

#	ARTICLE	IF	CITATIONS
748	Deficiency of XLF and PAXX prevents DNA double-strand break repair by non-homologous end joining in lymphocytes. <i>Cell Cycle</i> , 2017, 16, 286-295.	1.3	36
749	CRISPR-Based Technologies for the Manipulation of Eukaryotic Genomes. <i>Cell</i> , 2017, 168, 20-36.	13.5	783
750	CRISPR/Cas9-The ultimate weapon to battle infectious diseases?. <i>Cellular Microbiology</i> , 2017, 19, e12693.	1.1	56
751	Gene editing for cell engineering: trends and applications. <i>Critical Reviews in Biotechnology</i> , 2017, 37, 672-684.	5.1	86
752	Phenotypic screening with primary neurons to identify drug targets for regeneration and degeneration. <i>Molecular and Cellular Neurosciences</i> , 2017, 80, 161-169.	1.0	20
754	Targeted Gene Activation Using RNA-Guided Nucleases. <i>Methods in Molecular Biology</i> , 2017, 1468, 235-250.	0.4	5
755	Synthetic Lethality in Cancer Therapeutics. <i>Annual Review of Cancer Biology</i> , 2017, 1, 141-161.	2.3	36
756	CRISPR/Cas9 Technique for Identification of Genes Regulating Oxaliplatin Resistance of Pancreatic Cancer Cell Line. <i>BioNanoScience</i> , 2017, 7, 97-100.	1.5	5
757	In Silico Meets In Vivo : Towards Computational CRISPR-Based sgRNA Design. <i>Trends in Biotechnology</i> , 2017, 35, 12-21.	4.9	96
758	Genome-wide CRISPR screens reveal a Wntâ€‘FZD5 signaling circuit as a druggable vulnerability of RNF43-mutant pancreatic tumors. <i>Nature Medicine</i> , 2017, 23, 60-68.	15.2	261
759	Modeling of Autism Using Organoid Technology. <i>Molecular Neurobiology</i> , 2017, 54, 7789-7795.	1.9	17
760	Identify Key Sequence Features to Improve CRISPR sgRNA Efficacy. <i>IEEE Access</i> , 2017, 5, 26582-26590.	2.6	153
761	Improved detection of synthetic lethal interactions in <i>Drosophila</i> cells using variable dose analysis (VDA). <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2017, 114, E10755-E10762.	3.3	8
762	FnCpf1: a novel and efficient genome editing tool for <i>Saccharomyces cerevisiae</i> . <i>Nucleic Acids Research</i> , 2017, 45, 12585-12598.	6.5	116
763	RUNX2 expression in thyroid and breast cancer requires the cooperation of three non-redundant enhancers under the control of BRD4 and c-JUN. <i>Nucleic Acids Research</i> , 2017, 45, 11249-11267.	6.5	57
764	Generation of an arrayed CRISPR-Cas9 library targeting epigenetic regulators: from high-content screens to <i>in vivo</i> assays. <i>Epigenetics</i> , 2017, 12, 1065-1075.	1.3	28
765	A framework for exhaustively mapping functional missense variants. <i>Molecular Systems Biology</i> , 2017, 13, 957.	3.2	146
766	A Universal Protocol for Large-scale gRNA Library Production from any DNA Source. <i>Journal of Visualized Experiments</i> , 2017, , .	0.2	2

#	ARTICLE	IF	CITATIONS
767	Flexible CRISPR library construction using parallel oligonucleotide retrieval. <i>Nucleic Acids Research</i> , 2017, 45, e101-e101.	6.5	11
768	Genome Engineering Using Haploid Embryonic Stem Cells. <i>Progress in Molecular Biology and Translational Science</i> , 2017, 152, 83-94.	0.9	0
769	ENCoRE: an efficient software for CRISPR screens identifies new players in extrinsic apoptosis. <i>BMC Genomics</i> , 2017, 18, 905.	1.2	15
770	Heritable Genomic Fragment Deletions and Small Indels in the Putative ENGase Gene Induced by CRISPR/Cas9 in Barley. <i>Frontiers in Plant Science</i> , 2017, 8, 540.	1.7	146
771	A permutation-based non-parametric analysis of CRISPR screen data. <i>BMC Genomics</i> , 2017, 18, 545.	1.2	26
772	Simple Meets Single: The Application of CRISPR/Cas9 in Haploid Embryonic Stem Cells. <i>Stem Cells International</i> , 2017, 2017, 1-6.	1.2	5
773	KEAP1 loss modulates sensitivity to kinase targeted therapy in lung cancer. <i>ELife</i> , 2017, 6, .	2.8	92
774	Modeling Cancer Using CRISPR-Cas9 Technology. , 2017, , 905-924.		0
775	Frameshift indels introduced by genome editing can lead to in-frame exon skipping. <i>PLoS ONE</i> , 2017, 12, e0178700.	1.1	77
776	CRISPR History: Discovery, Characterization, and Prosperity. <i>Progress in Molecular Biology and Translational Science</i> , 2017, 152, 1-21.	0.9	20
777	Scalable Design of Paired CRISPR Guide RNAs for Genomic Deletion. <i>PLoS Computational Biology</i> , 2017, 13, e1005341.	1.5	64
778	CRISPulator: a discrete simulation tool for pooled genetic screens. <i>BMC Bioinformatics</i> , 2017, 18, 347.	1.2	19
779	Increasing on-target cleavage efficiency for CRISPR/Cas9-induced large fragment deletion in <i>Mycococcus xanthus</i> . <i>Microbial Cell Factories</i> , 2017, 16, 142.	1.9	21
780	The lncRNA CASC15 regulates SOX4 expression in RUNX1-rearranged acute leukemia. <i>Molecular Cancer</i> , 2017, 16, 126.	7.9	108
781	RNA inverse folding using Monte Carlo tree search. <i>BMC Bioinformatics</i> , 2017, 18, 468.	1.2	8
782	CRISPR/Cas9 Technology: Applications and Human Disease Modeling. <i>Progress in Molecular Biology and Translational Science</i> , 2017, 152, 23-48.	0.9	17
783	Aftermath of the Human Genome Project: an era of struggle and discovery. <i>Turkish Journal of Biology</i> , 2017, 41, 403-418.	2.1	3
784	Origins and Applications of CRISPR-Mediated Genome Editing. <i>The Einstein Journal of Biology and Medicine: EJBm</i> , 2017, 31, 2.	0.2	3

#	ARTICLE	IF	CITATIONS
785	Genetic and epigenetic control of gene expression by CRISPR-Cas systems. <i>F1000Research</i> , 2017, 6, 747.	0.8	58
786	Drug Discovery Technologies: Current and Future Trends. , 2017, , 1-32.		4
787	From huntingtin gene to Huntington's disease-altering strategies. , 2017, , 251-276.		0
788	CRISPR-Cas9: a promising tool for gene editing on induced pluripotent stem cells. <i>Korean Journal of Internal Medicine</i> , 2017, 32, 42-61.	0.7	45
789	Introduction of the MDM2 T309G Mutation in Primary Human Retinal Epithelial Cells Enhances Experimental Proliferative Vitreoretinopathy. , 2017, 58, 5361.		17
790	Genome-wide CRISPR-Cas9 Screen Identifies Leukemia-Specific Dependence on a Pre-mRNA Metabolic Pathway Regulated by DCPS. <i>Cancer Cell</i> , 2018, 33, 386-400.e5.	7.7	99
791	A Non-catalytic Function of SETD1A Regulates Cyclin K and the DNA Damage Response. <i>Cell</i> , 2018, 172, 1007-1021.e17.	13.5	97
792	Toward an integrated map of genetic interactions in cancer cells. <i>Molecular Systems Biology</i> , 2018, 14, e7656.	3.2	64
793	Mapping a functional cancer genome atlas of tumor suppressors in mouse liver using AAV-CRISPR-mediated direct in vivo screening. <i>Science Advances</i> , 2018, 4, eaao5508.	4.7	64
794	HP1 links centromeric heterochromatin to centromere cohesion in mammals. <i>EMBO Reports</i> , 2018, 19, .	2.0	45
795	CRISPR-based methods for high-throughput annotation of regulatory DNA. <i>Current Opinion in Biotechnology</i> , 2018, 52, 32-41.	3.3	13
796	New tools for old drugs: Functional genetic screens to optimize current chemotherapy. <i>Drug Resistance Updates</i> , 2018, 36, 30-46.	6.5	33
797	CRISPR-Cas9 screens in human cells and primary neurons identify modifiers of C9ORF72 dipeptide-repeat-protein toxicity. <i>Nature Genetics</i> , 2018, 50, 603-612.	9.4	178
798	The potential of CRISPR/Cas9 genome editing for the study and treatment of intervertebral disc pathologies. <i>JOR Spine</i> , 2018, 1, e1003.	1.5	26
799	Modular Ligation Extension of Guide RNA Operons (LEGO) for Multiplexed dCas9 Regulation of Metabolic Pathways in <i>Saccharomyces cerevisiae</i> . <i>Biotechnology Journal</i> , 2018, 13, e1700582.	1.8	31
800	CRISPR/Cas9 cleavage efficiency regression through boosting algorithms and Markov sequence profiling. <i>Bioinformatics</i> , 2018, 34, 3069-3077.	1.8	39
801	Cutting Edge Genetics: CRISPR/Cas9 Editing of Plant Genomes. <i>Plant and Cell Physiology</i> , 2018, 59, 1608-1620.	1.5	40
802	An Integrated Genome-wide CRISPRa Approach to Functionalize lncRNAs in Drug Resistance. <i>Cell</i> , 2018, 173, 649-664.e20.	13.5	238

#	ARTICLE	IF	CITATIONS
803	Development of capability for genome-scale CRISPR-Cas9 knockout screens in New Zealand. <i>Journal of the Royal Society of New Zealand</i> , 2018, 48, 245-261.	1.0	1
804	High-throughput genetic screens using CRISPR-Cas9 system. <i>Archives of Pharmacal Research</i> , 2018, 41, 875-884.	2.7	23
805	Genome-wide CRISPR/Cas9 Screen Identifies Host Factors Essential for Influenza Virus Replication. <i>Cell Reports</i> , 2018, 23, 596-607.	2.9	185
806	Characterization of PIK3CA and PIK3R1 somatic mutations in Chinese breast cancer patients. <i>Nature Communications</i> , 2018, 9, 1357.	5.8	100
807	Review of CRISPR/Cas9 sgRNA Design Tools. <i>Interdisciplinary Sciences, Computational Life Sciences</i> , 2018, 10, 455-465.	2.2	180
808	Integrated design, execution, and analysis of arrayed and pooled CRISPR genome-editing experiments. <i>Nature Protocols</i> , 2018, 13, 946-986.	5.5	70
809	Insights into maize genome editing via CRISPR/Cas9. <i>Physiology and Molecular Biology of Plants</i> , 2018, 24, 175-183.	1.4	37
810	A CRISPR-based screen for Hedgehog signaling provides insights into ciliary function and ciliopathies. <i>Nature Genetics</i> , 2018, 50, 460-471.	9.4	140
811	Multigene delivery in mammalian cells: Recent advances and applications. <i>Biotechnology Advances</i> , 2018, 36, 871-879.	6.0	10
812	Target identification of small molecules using large-scale CRISPR-Cas mutagenesis scanning of essential genes. <i>Nature Communications</i> , 2018, 9, 502.	5.8	84
813	Hallmarks of cancer: The CRISPR generation. <i>European Journal of Cancer</i> , 2018, 93, 10-18.	1.3	54
814	CRISPR/Cas9 cleavages in budding yeast reveal templated insertions and strand-specific insertion/deletion profiles. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2018, 115, E2040-E2047.	3.3	152
815	Combinatorial CRISPR-Cas9 Metabolic Screens Reveal Critical Redox Control Points Dependent on the KEAP1-NRF2 Regulatory Axis. <i>Molecular Cell</i> , 2018, 69, 699-708.e7.	4.5	81
816	Cell-specific responses to the cytokine $\text{TGF}\beta^2$ are determined by variability in protein levels. <i>Molecular Systems Biology</i> , 2018, 14, e7733.	3.2	50
817	Glioma tumor suppressor candidate region gene 1 (GLTSCR1) and its paralog GLTSCR1-like form SWI/SNF chromatin remodeling subcomplexes. <i>Journal of Biological Chemistry</i> , 2018, 293, 3892-3903.	1.6	158
818	Deep learning improves prediction of CRISPR-Cpf1 guide RNA activity. <i>Nature Biotechnology</i> , 2018, 36, 239-241.	9.4	252
819	Exosome-Liposome Hybrid Nanoparticles Deliver CRISPR/Cas9 System in MSCs. <i>Advanced Science</i> , 2018, 5, 1700611.	5.6	373
820	Molecular biology at the cutting edge: A review on CRISPR/CAS9 gene editing for undergraduates. <i>Biochemistry and Molecular Biology Education</i> , 2018, 46, 195-205.	0.5	75

#	ARTICLE	IF	CITATIONS
821	Construction of green fluorescence protein mutant to monitor STT 3B-dependent N-glycosylation. <i>FEBS Journal</i> , 2018, 285, 915-928.	2.2	6
822	Current Status of Nonviral Vectors for Gene Therapy in China. <i>Human Gene Therapy</i> , 2018, 29, 110-120.	1.4	16
823	CRISPR/Cas9: A tool for immunological research. <i>European Journal of Immunology</i> , 2018, 48, 576-583.	1.6	19
824	CRISPR-Cas9: a promising genetic engineering approach in cancer research. <i>Therapeutic Advances in Medical Oncology</i> , 2018, 10, 175883401875508.	1.4	31
825	Tuning CRISPR-Cas9 Gene Drives in <i>Saccharomyces cerevisiae</i> . <i>G3: Genes, Genomes, Genetics</i> , 2018, 8, 999-1018.	0.8	40
826	Large-scale image-based profiling of single-cell phenotypes in arrayed CRISPR-Cas9 gene perturbation screens. <i>Molecular Systems Biology</i> , 2018, 14, e8064.	3.2	56
827	Emerging Alphaviruses Are Sensitive to Cellular States Induced by a Novel Small-Molecule Agonist of the STING Pathway. <i>Journal of Virology</i> , 2018, 92, .	1.5	46
828	Genome-wide CRISPR screen for PARKIN regulators reveals transcriptional repression as a determinant of mitophagy. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2018, 115, E180-E189.	3.3	73
829	Clustered Regularly Interspaced Short Palindromic Repeats/Cas9 Triggered Isothermal Amplification for Site-Specific Nucleic Acid Detection. <i>Analytical Chemistry</i> , 2018, 90, 2193-2200.	3.2	204
830	CRISPR Approaches to Small Molecule Target Identification. <i>ACS Chemical Biology</i> , 2018, 13, 366-375.	1.6	68
831	CRISPR-Cas9-based genome-wide screening of <i>Toxoplasma gondii</i> . <i>Nature Protocols</i> , 2018, 13, 307-323.	5.5	46
832	Use of CRISPR/Cas9 gene-editing tools for developing models in drug discovery. <i>Drug Discovery Today</i> , 2018, 23, 519-533.	3.2	31
833	A small-molecule inhibitor of the ubiquitin activating enzyme for cancer treatment. <i>Nature Medicine</i> , 2018, 24, 186-193.	15.2	258
834	Advances in Engineering the Fly Genome with the CRISPR-Cas System. <i>Genetics</i> , 2018, 208, 1-18.	1.2	154
835	A validated gRNA library for CRISPR/Cas9 targeting of the human glycosyltransferase genome. <i>Glycobiology</i> , 2018, 28, 295-305.	1.3	70
836	Prediction of off-target activities for the end-to-end design of CRISPR guide RNAs. <i>Nature Biomedical Engineering</i> , 2018, 2, 38-47.	11.6	230
837	Bartender: a fast and accurate clustering algorithm to count barcode reads. <i>Bioinformatics</i> , 2018, 34, 739-747.	1.8	71
838	Cpf1-Database: web-based genome-wide guide RNA library design for gene knockout screens using CRISPR-Cpf1. <i>Bioinformatics</i> , 2018, 34, 1077-1079.	1.8	22

#	ARTICLE	IF	CITATIONS
839	Refined sgRNA efficacy prediction improves large- and small-scale CRISPR-Cas9 applications. <i>Nucleic Acids Research</i> , 2018, 46, 1375-1385.	6.5	213
840	MicroRNA-focused CRISPR-Cas9 library screen reveals fitness-associated miRNAs. <i>Rna</i> , 2018, 24, 966-981.	1.6	58
841	Ligase IV inhibitor SCR7 enhances gene editing directed by CRISPR-Cas9 and ssODN in human cancer cells. <i>Cell and Bioscience</i> , 2018, 8, 12.	2.1	69
842	Pulling the genome in opposite directions to dissect gene networks. <i>Genome Biology</i> , 2018, 19, 42.	3.8	1
843	A CRISPR knockout screen identifies SETDB1-target retroelement silencing factors in embryonic stem cells. <i>Genome Research</i> , 2018, 28, 846-858.	2.4	54
844	Emerging Approaches for the Identification of Protein Targets of Small Molecules - A Practitioners' Perspective. <i>Journal of Medicinal Chemistry</i> , 2018, 61, 8504-8535.	2.9	55
845	Arrayed CRISPR screen with image-based assay reliably uncovers host genes required for coxsackievirus infection. <i>Genome Research</i> , 2018, 28, 859-868.	2.4	45
846	CRISPR genetic screens to discover host-virus interactions. <i>Current Opinion in Virology</i> , 2018, 29, 87-100.	2.6	23
847	Shortening the list of essential genes in the human genome by network analysis. <i>Meta Gene</i> , 2018, 17, 68-77.	0.3	3
848	Dysregulation of mitochondrial dynamics proteins are a targetable feature of human tumors. <i>Nature Communications</i> , 2018, 9, 1677.	5.8	96
849	ES cell-derived presomitic mesoderm-like tissues for analysis of synchronized oscillations in the segmentation clock. <i>Development (Cambridge)</i> , 2018, 145, .	1.2	48
850	Collection of homozygous mutant mouse embryonic stem cells arising from autodiploidization during haploid gene trap mutagenesis. <i>Nucleic Acids Research</i> , 2018, 46, e63-e63.	6.5	1
851	Cancer CRISPR Screens In Vivo. <i>Trends in Cancer</i> , 2018, 4, 349-358.	3.8	70
852	Applications of Gene Editing Technologies to Cellular Therapies. <i>Biology of Blood and Marrow Transplantation</i> , 2018, 24, 1537-1545.	2.0	3
853	Functional Insulator Scanning of CpG Islands to Identify Regulatory Regions of Promoters Using CRISPR. <i>Methods in Molecular Biology</i> , 2018, 1766, 285-301.	0.4	1
854	Detection of target DNA with a novel Cas9/sgRNAs-associated reverse PCR (CARP) technique. <i>Analytical and Bioanalytical Chemistry</i> , 2018, 410, 2889-2900.	1.9	54
855	Highly efficient heritable targeted deletions of gene clusters and non-coding regulatory regions in <i>Arabidopsis</i> using CRISPR/Cas9. <i>Scientific Reports</i> , 2018, 8, 4443.	1.6	63
856	Cis- and Trans-Modifiers of Repeat Expansions: Blending Model Systems with Human Genetics. <i>Trends in Genetics</i> , 2018, 34, 448-465.	2.9	25

#	ARTICLE	IF	CITATIONS
857	Screening Regulatory Element Function with CRISPR/Cas9-based Epigenome Editing. <i>Methods in Molecular Biology</i> , 2018, 1767, 447-480.	0.4	5
858	High efficient multisites genome editing in allotetraploid cotton (<i>Gossypium hirsutum</i>) using CRISPR/Cas9 system. <i>Plant Biotechnology Journal</i> , 2018, 16, 137-150.	4.1	202
859	Increasing the efficiency of CRISPR-Cas9 VQR precise genome editing in rice. <i>Plant Biotechnology Journal</i> , 2018, 16, 292-297.	4.1	78
860	CRISPR-engineered genome editing for the next generation neurological disease modeling. <i>Progress in Neuro-Psychopharmacology and Biological Psychiatry</i> , 2018, 81, 459-467.	2.5	11
861	A High-Resolution Genome-Wide CRISPR/Cas9 Viability Screen Reveals Structural Features and Contextual Diversity of the Human Cell-Essential Proteome. <i>Molecular and Cellular Biology</i> , 2018, 38, .	1.1	66
862	Enhanced guide-RNA design and targeting analysis for precise CRISPR genome editing of single and consortia of industrially relevant and non-model organisms. <i>Bioinformatics</i> , 2018, 34, 16-23.	1.8	36
863	CHO-Omics Review: The Impact of Current and Emerging Technologies on Chinese Hamster Ovary Based Bioproduction. <i>Biotechnology Journal</i> , 2018, 13, e1700227.	1.8	71
864	PICKLES: the database of pooled in-vitro CRISPR knockout library essentiality screens. <i>Nucleic Acids Research</i> , 2018, 46, D776-D780.	6.5	74
865	Human gene essentiality. <i>Nature Reviews Genetics</i> , 2018, 19, 51-62.	7.7	213
866	Emerging and evolving concepts in gene essentiality. <i>Nature Reviews Genetics</i> , 2018, 19, 34-49.	7.7	230
867	Ebola virus requires phosphatidylinositol (3,5) bisphosphate production for efficient viral entry. <i>Virology</i> , 2018, 513, 17-28.	1.1	41
868	CRISPRi and CRISPRa Screens in Mammalian Cells for Precision Biology and Medicine. <i>ACS Chemical Biology</i> , 2018, 13, 406-416.	1.6	248
869	CRISPR-Cas9 mediated gene knockout in human coronary artery endothelial cells reveals a pro-inflammatory role of TLR2. <i>Cell Biology International</i> , 2018, 42, 187-193.	1.4	11
870	Introduction to Cancer Stem Cells: Past, Present, and Future. <i>Methods in Molecular Biology</i> , 2018, 1692, 1-16.	0.4	16
871	Synthetic Lethal Vulnerabilities in <i>KRAS</i> -Mutant Cancers. <i>Cold Spring Harbor Perspectives in Medicine</i> , 2018, 8, a031518.	2.9	63
872	Induced mutation and epigenetics modification in plants for crop improvement by targeting CRISPR/Cas9 technology. <i>Journal of Cellular Physiology</i> , 2018, 233, 4578-4594.	2.0	19
873	High Efficiency Gene Correction in Hematopoietic Cells by Donor-Template-Free CRISPR/Cas9 Genome Editing. <i>Molecular Therapy - Nucleic Acids</i> , 2018, 10, 1-8.	2.3	34
874	Next-Generation Sequencing of Genome-Wide CRISPR Screens. <i>Methods in Molecular Biology</i> , 2018, 1712, 203-216.	0.4	36

#	ARTICLE	IF	CITATIONS
875	The Future of Multiplexed Eukaryotic Genome Engineering. ACS Chemical Biology, 2018, 13, 313-325.	1.6	30
876	Next Generation Sequencing. Methods in Molecular Biology, 2018, , .	0.4	2
877	Precision Medicine in Pediatric Neurooncology: A Review. ACS Chemical Neuroscience, 2018, 9, 11-28.	1.7	12
878	Mutagenesis of the FAE1 genes significantly changes fatty acid composition in seeds of Camelina sativa. Plant Physiology and Biochemistry, 2018, 123, 1-7.	2.8	98
879	Modeling Cancer in the CRISPR Era. Annual Review of Cancer Biology, 2018, 2, 111-131.	2.3	15
880	CRISPR/Cas9 library screening for drug target discovery. Journal of Human Genetics, 2018, 63, 179-186.	1.1	70
881	Emerging Approaches for Spatiotemporal Control of Targeted Genome with Inducible CRISPR-Cas9. Analytical Chemistry, 2018, 90, 429-439.	3.2	33
882	Diverse Class 2 CRISPR-Cas Effector Proteins for Genome Engineering Applications. ACS Chemical Biology, 2018, 13, 347-356.	1.6	25
883	CRISPR editing in biological and biomedical investigation. Journal of Cellular Physiology, 2018, 233, 3875-3891.	2.0	19
884	Genetic correction of adipose tissue-derived mesenchymal stem cells mediated by TALEN targeting the GDF5 gene. International Journal of Molecular Medicine, 2018, 41, 2397-2405.	1.8	4
885	Application of Arrayed CRISPR/cas9 Screen and its Data Analysis: a Systematic Review. , 2018, , .		0
886	The sterol-responsive RNF145 E3 ubiquitin ligase mediates the degradation of HMG-CoA reductase together with gp78 and Hrd1. ELife, 2018, 7, .	2.8	85
887	Progress toward Precise Genetic Repair in Neurons. Epilepsy Currents, 2018, 18, 121-122.	0.4	0
888	Genome-wide CRISPR-dCas9 screens in E. coli identify essential genes and phage host factors. PLoS Genetics, 2018, 14, e1007749.	1.5	163
889	Modulating the expression of long non-coding RNA s for functional studies. EMBO Reports, 2018, 19, .	2.0	57
890	Paring down to the essentials. Science, 2018, 362, 904-904.	6.0	0
891	Genome-wide CRISPR Screens in Primary Human T Cells Reveal Key Regulators of Immune Function. Cell, 2018, 175, 1958-1971.e15.	13.5	378
892	CRISPR/Cas9 for Cancer Therapy: Hopes and Challenges. Biomedicines, 2018, 6, 105.	1.4	76

#	ARTICLE	IF	CITATIONS
893	Identification of phagocytosis regulators using magnetic genome-wide CRISPR screens. <i>Nature Genetics</i> , 2018, 50, 1716-1727.	9.4	135
894	Aptazyme-mediated direct modulation of post-transcriptional sgRNA level for conditional genome editing and gene expression. <i>Journal of Biotechnology</i> , 2018, 288, 23-29.	1.9	11
895	Clustering-local-unique-enriched-signals (CLUES) promotes identification of novel regulators of ES cell self-renewal and pluripotency. <i>PLoS ONE</i> , 2018, 13, e0206844.	1.1	1
896	Optimized libraries for CRISPR-Cas9 genetic screens with multiple modalities. <i>Nature Communications</i> , 2018, 9, 5416.	5.8	535
897	Applications of CRISPR-Cas in Bioengineering, Biotechnology, and Translational Research. <i>CRISPR Journal</i> , 2018, 1, 379-404.	1.4	17
898	High-resolution mapping of cancer cell networks using co-functional interactions. <i>Molecular Systems Biology</i> , 2018, 14, e8594.	3.2	61
899	Genome Editing Using Crispr/Cas System: New Era Genetic Technology in Agriculture to Boost Crop Output. <i>European Journal of Experimental Biology</i> , 2018, 07, .	0.3	3
900	A simple and efficient CRISPR/Cas9 platform for induction of single and multiple, heritable mutations in barley (<i>Hordeum vulgare</i> L.). <i>Plant Methods</i> , 2018, 14, 111.	1.9	63
901	New Developments in CRISPR Technology: Improvements in Specificity and Efficiency. <i>Current Pharmaceutical Biotechnology</i> , 2018, 18, 1038-1054.	0.9	12
902	A Highly Efficient Cell Division-Specific CRISPR/Cas9 System Generates Homozygous Mutants for Multiple Genes in Arabidopsis. <i>International Journal of Molecular Sciences</i> , 2018, 19, 3925.	1.8	43
903	Emerging Concepts and Techniques. , 2018, , 729-743.		0
904	Genetic Mouse Models for Female Reproductive Toxicology Studies. , 2018, , 470-494.		0
905	Mutant p53s generate pro-invasive niches by influencing exosome podocalyxin levels. <i>Nature Communications</i> , 2018, 9, 5069.	5.8	91
906	CTCF Expression is Essential for Somatic Cell Viability and Protection Against Cancer. <i>International Journal of Molecular Sciences</i> , 2018, 19, 3832.	1.8	17
907	The construction of drug-resistant cancer cell lines by CRISPR/Cas9 system for drug screening. <i>Science Bulletin</i> , 2018, 63, 1411-1419.	4.3	16
908	Guide Swap enables genome-scale pooled CRISPR-Cas9 screening in human primary cells. <i>Nature Methods</i> , 2018, 15, 941-946.	9.0	63
909	CRISPR-Cas9 ribonucleoprotein-mediated co-editing and counterselection in the rice blast fungus. <i>Scientific Reports</i> , 2018, 8, 14355.	1.6	136
910	High-Throughput Genotyping of CRISPR/Cas Edited Cells in 96-Well Plates. <i>Methods and Protocols</i> , 2018, 1, 29.	0.9	6

#	ARTICLE	IF	CITATIONS
911	Recognition of CRISPR/Cas9 off-target sites through ensemble learning of uneven mismatch distributions. <i>Bioinformatics</i> , 2018, 34, i757-i765.	1.8	38
912	Blank spots on the map: some current questions on nuclear organization and genome architecture. <i>Histochemistry and Cell Biology</i> , 2018, 150, 579-592.	0.8	24
913	CRISPR-Based Editing Reveals Edge-Specific Effects in Biological Networks. <i>CRISPR Journal</i> , 2018, 1, 286-293.	1.4	10
914	A Membrane Transporter Is Required for Steroid Hormone Uptake in <i>Drosophila</i> . <i>Developmental Cell</i> , 2018, 47, 294-305.e7.	3.1	102
915	Regulation of the Hippo Pathway by Phosphatidic Acid-Mediated Lipid-Protein Interaction. <i>Molecular Cell</i> , 2018, 72, 328-340.e8.	4.5	74
916	CRISPhieRmix: a hierarchical mixture model for CRISPR pooled screens. <i>Genome Biology</i> , 2018, 19, 159.	3.8	36
917	CRISPR Activation Screens Systematically Identify Factors that Drive Neuronal Fate and Reprogramming. <i>Cell Stem Cell</i> , 2018, 23, 758-771.e8.	5.2	161
918	Use of CRISPR/Cas9 technology efficiently targetted goat myostatin through zygotes microinjection resulting in double-musled phenotype in goats. <i>Bioscience Reports</i> , 2018, 38, .	1.1	53
919	A New Era in Functional Genomics Using CRISPR/Cas9 Knockout Screening. <i>Journal of Molecular and Genetic Medicine: an International Journal of Biomedical Research</i> , 2018, 12, .	0.1	0
920	CRISPR-Cas9 off-targeting assessment with nucleic acid duplex energy parameters. <i>Genome Biology</i> , 2018, 19, 177.	3.8	105
921	The CRISPR/Cas revolution continues: From efficient gene editing for crop breeding to plant synthetic biology. <i>Journal of Integrative Plant Biology</i> , 2018, 60, 1127-1153.	4.1	109
922	Genome-wide screening for functional long noncoding RNAs in human cells by Cas9 targeting of splice sites. <i>Nature Biotechnology</i> , 2018, 36, 1203-1210.	9.4	120
923	SHQ1 regulation of RNA splicing is required for T-lymphoblastic leukemia cell survival. <i>Nature Communications</i> , 2018, 9, 4281.	5.8	24
924	CRISPR/Cas9 System: A Bacterial Tailor for Genomic Engineering. <i>Genetics Research International</i> , 2018, 2018, 1-17.	2.0	19
925	Synthetic lethality between HER2 and transaldolase in intrinsically resistant HER2-positive breast cancers. <i>Nature Communications</i> , 2018, 9, 4274.	5.8	25
926	CRISPR knockout screening identifies combinatorial drug targets in pancreatic cancer and models cellular drug response. <i>Nature Communications</i> , 2018, 9, 4275.	5.8	56
927	An Inducible Alpha-Synuclein Expressing Neuronal Cell Line Model for Parkinson's Disease. <i>Journal of Alzheimer's Disease</i> , 2018, 66, 453-460.	1.2	11
928	Stem Cells, Genome Editing, and the Path to Translational Medicine. <i>Cell</i> , 2018, 175, 615-632.	13.5	105

#	ARTICLE	IF	CITATIONS
929	Acceleration of cancer science with genome editing and related technologies. <i>Cancer Science</i> , 2018, 109, 3679-3685.	1.7	20
930	Heterozygous deletion of chromosome 17p renders prostate cancer vulnerable to inhibition of RNA polymerase II. <i>Nature Communications</i> , 2018, 9, 4394.	5.8	27
931	Altered patterns of global protein synthesis and translational fidelity in RPS15-mutated chronic lymphocytic leukemia. <i>Blood</i> , 2018, 132, 2375-2388.	0.6	48
932	The application of gene silencing in proteomics: from laboratory to clinic. <i>Expert Review of Proteomics</i> , 2018, 15, 717-732.	1.3	5
933	Defining Essentiality Score of Protein-Coding Genes and Long Noncoding RNAs. <i>Frontiers in Genetics</i> , 2018, 9, 380.	1.1	30
934	HORMAD1 Is a Negative Prognostic Indicator in Lung Adenocarcinoma and Specifies Resistance to Oxidative and Genotoxic Stress. <i>Cancer Research</i> , 2018, 78, 6196-6208.	0.4	50
935	A limited number of double-strand DNA breaks is sufficient to delay cell cycle progression. <i>Nucleic Acids Research</i> , 2018, 46, 10132-10144.	6.5	67
936	Human Neural Stem Cells. <i>Results and Problems in Cell Differentiation</i> , 2018, , .	0.2	3
937	Detecting and typing target DNA with a novel CRISPR-typing PCR (ctPCR) technique. <i>Analytical Biochemistry</i> , 2018, 561-562, 37-46.	1.1	35
938	Efficient Production and Identification of CRISPR/Cas9-generated Gene Knockouts in the Model System <i>Danio rerio</i> . <i>Journal of Visualized Experiments</i> , 2018, , .	0.2	16
939	Mutant FUS causes DNA ligation defects to inhibit oxidative damage repair in Amyotrophic Lateral Sclerosis. <i>Nature Communications</i> , 2018, 9, 3683.	5.8	141
940	PLK1 targets CtIP to promote microhomology-mediated end joining. <i>Nucleic Acids Research</i> , 2018, 46, 10724-10739.	6.5	26
941	Genome Editing in Human Neural Stem and Progenitor Cells. <i>Results and Problems in Cell Differentiation</i> , 2018, 66, 163-182.	0.2	1
942	Interrogating the protein interactomes of RAS isoforms identifies PIP5K1A as a KRAS-specific vulnerability. <i>Nature Communications</i> , 2018, 9, 3646.	5.8	56
943	Unraveling of Central Nervous System Disease Mechanisms Using CRISPR Genome Manipulation. <i>Journal of Central Nervous System Disease</i> , 2018, 10, 117957351878746.	0.7	7
944	Shedding Light on the Dark Cancer Genomes: Long Noncoding RNAs as Novel Biomarkers and Potential Therapeutic Targets for Cancer. <i>Molecular Cancer Therapeutics</i> , 2018, 17, 1816-1823.	1.9	30
945	Head and Neck Tumors. , 2018, , 1-136.		1
946	Synthetic transcription factors for cell fate reprogramming. <i>Current Opinion in Genetics and Development</i> , 2018, 52, 13-21.	1.5	29

#	ARTICLE	IF	CITATIONS
947	Delivering CRISPR: a review of the challenges and approaches. <i>Drug Delivery</i> , 2018, 25, 1234-1257.	2.5	776
948	Using iPSC Models to Probe Regulation of Cardiac Ion Channel Function. <i>Current Cardiology Reports</i> , 2018, 20, 57.	1.3	6
949	The new normal of structure/function studies in the era of CRISPR/Cas9. <i>Biochemical Journal</i> , 2018, 475, 1635-1642.	1.7	1
950	CRISPR/Cas9 Genome Editing Using Gold Nanoparticle-Mediated Laserporation. <i>Advanced Biology</i> , 2018, 2, 1700184.	3.0	16
951	Improved design and analysis of CRISPR knockout screens. <i>Bioinformatics</i> , 2018, 34, 4095-4101.	1.8	44
952	CRISPR/Cas9 mediated targeting of multiple genes in <i>Dictyostelium</i> . <i>Scientific Reports</i> , 2018, 8, 8471.	1.6	59
953	CTCF boundary remodels chromatin domain and drives aberrant HOX gene transcription in acute myeloid leukemia. <i>Blood</i> , 2018, 132, 837-848.	0.6	56
954	Application of the CRISPR/Cas9 System to Drug Resistance in Breast Cancer. <i>Advanced Science</i> , 2018, 5, 1700964.	5.6	61
955	The CRISPR tool kit for genome editing and beyond. <i>Nature Communications</i> , 2018, 9, 1911.	5.8	1,159
956	CK1 \pm and IRF4 are essential and independent effectors of immunomodulatory drugs in primary effusion lymphoma. <i>Blood</i> , 2018, 132, 577-586.	0.6	39
957	Is Pooled CRISPR-Screening the Dawn of a New Era for Functional Genomics. <i>Advances in Experimental Medicine and Biology</i> , 2018, 1068, 171-176.	0.8	3
959	A Novel CRISPR/Cas9-Based Cellular Model to Explore Adenylyl Cyclase and cAMP Signaling. <i>Molecular Pharmacology</i> , 2018, 94, 963-972.	1.0	23
960	Functional Genomics. , 2018, , 77-88.		0
961	Synthetic Lethal Networks for Precision Oncology: Promises and Pitfalls. <i>Journal of Molecular Biology</i> , 2018, 430, 2900-2912.	2.0	21
962	Integrating genetic and protein-protein interaction networks maps a functional wiring diagram of a cell. <i>Current Opinion in Microbiology</i> , 2018, 45, 170-179.	2.3	31
963	Targeted Genome Editing Techniques in <i>C. elegans</i> and Other Nematode Species. , 0, , 3-21.		0
964	Hippo signaling dysfunction induces cancer cell addiction to YAP. <i>Oncogene</i> , 2018, 37, 6414-6424.	2.6	31
965	The Current State and Future of CRISPR-Cas9 gRNA Design Tools. <i>Frontiers in Pharmacology</i> , 2018, 9, 749.	1.6	103

#	ARTICLE	IF	CITATIONS
966	Insights into neural crest development from studies of avian embryos. <i>International Journal of Developmental Biology</i> , 2018, 62, 183-194.	0.3	20
967	Application of CRISPR for Pooled, Vector-based Functional Genomic Screening in Mammalian Cell Lines. , 0, , 209-222.		0
968	Generation and Utilization of CRISPR/Cas9 Screening Libraries in Mammalian Cells. , 0, , 223-234.		1
969	Chromatin accessibility is associated with CRISPR-Cas9 efficiency in the zebrafish (<i>Danio rerio</i>). <i>PLoS ONE</i> , 2018, 13, e0196238.	1.1	82
970	Small RNA-mediated prevention, diagnosis and therapies of cancer. , 2018, , 341-436.		0
971	CRISPR-Cas System: History and Prospects as a Genome Editing Tool in Microorganisms. <i>Current Microbiology</i> , 2018, 75, 1675-1683.	1.0	40
972	CRISPR-Cas Targeting of Host Genes as an Antiviral Strategy. <i>Viruses</i> , 2018, 10, 40.	1.5	35
973	CRISPR-Cas9 Genetic Analysis of Virus-Host Interactions. <i>Viruses</i> , 2018, 10, 55.	1.5	20
974	An enhanced CRISPR repressor for targeted mammalian gene regulation. <i>Nature Methods</i> , 2018, 15, 611-616.	9.0	361
975	CRISPR-Cas9: A cornerstone for the evolution of precision medicine. <i>Annals of Human Genetics</i> , 2018, 82, 331-357.	0.3	13
976	CRISPR-Cas13 Precision Transcriptome Engineering in Cancer. <i>Cancer Research</i> , 2018, 78, 4107-4113.	0.4	66
977	An automated microfluidic gene-editing platform for deciphering cancer genes. <i>Lab on A Chip</i> , 2018, 18, 2300-2312.	3.1	31
978	Estrogen-regulated feedback loop limits the efficacy of estrogen receptor-targeted breast cancer therapy. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2018, 115, 7869-7878.	3.3	55
979	Genome-wide CRISPR-KO Screen Uncovers mTORC1-Mediated Gsk3 Regulation in Naive Pluripotency Maintenance and Dissolution. <i>Cell Reports</i> , 2018, 24, 489-502.	2.9	77
980	Histidine catabolism is a major determinant of methotrexate sensitivity. <i>Nature</i> , 2018, 559, 632-636.	13.7	238
981	CRISPR-enhanced engineering of therapy-sensitive cancer cells for self-targeting of primary and metastatic tumors. <i>Science Translational Medicine</i> , 2018, 10, .	5.8	39
982	DeepCRISPR: optimized CRISPR guide RNA design by deep learning. <i>Genome Biology</i> , 2018, 19, 80.	3.8	285
983	Current applications of antibody microarrays. <i>Clinical Proteomics</i> , 2018, 15, 7.	1.1	75

#	ARTICLE	IF	CITATIONS
984	Rapid Control of Genome Editing in Human Cells by Chemical-Inducible CRISPR-Cas Systems. <i>Methods in Molecular Biology</i> , 2018, 1772, 267-288.	0.4	2
985	CAMKs support development of acute myeloid leukemia. <i>Journal of Hematology and Oncology</i> , 2018, 11, 30.	6.9	26
986	Targeted genome engineering in human induced pluripotent stem cells from patients with hemophilia B using the CRISPR-Cas9 system. <i>Stem Cell Research and Therapy</i> , 2018, 9, 92.	2.4	59
987	Genome-scale engineering of <i>Saccharomyces cerevisiae</i> with single-nucleotide precision. <i>Nature Biotechnology</i> , 2018, 36, 505-508.	9.4	149
988	Vitamin D Switches BAF Complexes to Protect \hat{I}^2 Cells. <i>Cell</i> , 2018, 173, 1135-1149.e15.	13.5	162
989	Translating GWAS in rheumatic disease: approaches to establishing mechanism and function for genetic associations with ankylosing spondylitis. <i>Briefings in Functional Genomics</i> , 2018, 17, 308-318.	1.3	6
990	Proteomic profiling identifies key coactivators utilized by mutant ER \hat{I}^{\pm} proteins as potential new therapeutic targets. <i>Oncogene</i> , 2018, 37, 4581-4598.	2.6	51
991	Promises and challenges in insect-plant interactions. <i>Entomologia Experimentalis Et Applicata</i> , 2018, 166, 319-343.	0.7	66
992	Selective gene dependencies in MYCN-amplified neuroblastoma include the core transcriptional regulatory circuitry. <i>Nature Genetics</i> , 2018, 50, 1240-1246.	9.4	199
993	Multiplexed assays of variant effects contribute to a growing genotype-phenotype atlas. <i>Human Genetics</i> , 2018, 137, 665-678.	1.8	91
994	CREBBP/EP300 bromodomains are critical to sustain the GATA1/MYC regulatory axis in proliferation. <i>Epigenetics and Chromatin</i> , 2018, 11, 30.	1.8	43
995	Fine-tuning of <i>fgf8a</i> expression through alternative polyadenylation has a selective impact on Fgf-associated developmental processes. <i>Biochimica Et Biophysica Acta - Gene Regulatory Mechanisms</i> , 2018, 1861, 783-793.	0.9	0
996	CUEDC1 is a primary target of ER \hat{I}^{\pm} essential for the growth of breast cancer cells. <i>Cancer Letters</i> , 2018, 436, 87-95.	3.2	7
997	Screening for genes that regulate the differentiation of human megakaryocytic lineage cells. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2018, 115, E9308-E9316.	3.3	22
998	In situ plasmonic generation in functional ionic-gold-nanogel scaffold for rapid quantitative bio-sensing. <i>Biosensors and Bioelectronics</i> , 2018, 120, 77-84.	5.3	22
999	Endogenous HIF2A reporter systems for high-throughput functional screening. <i>Scientific Reports</i> , 2018, 8, 12063.	1.6	2
1000	WDR41 supports lysosomal response to changes in amino acid availability. <i>Molecular Biology of the Cell</i> , 2018, 29, 2213-2227.	0.9	31
1001	Gene essentiality landscape and druggable oncogenic dependencies in herpesviral primary effusion lymphoma. <i>Nature Communications</i> , 2018, 9, 3263.	5.8	50

#	ARTICLE	IF	CITATIONS
1002	Genome-wide CRISPR screen identifies <i>TMEM41B</i> as a gene required for autophagosome formation. <i>Journal of Cell Biology</i> , 2018, 217, 3817-3828.	2.3	168
1003	CRISPR/Cas9-based gene targeting using synthetic guide RNAs enables robust cell biological analyses. <i>Molecular Biology of the Cell</i> , 2018, 29, 2370-2377.	0.9	14
1004	Unsupervised correction of gene-independent cell responses to CRISPR-Cas9 targeting. <i>BMC Genomics</i> , 2018, 19, 604.	1.2	75
1005	CRISPR Technology for Breast Cancer: Diagnostics, Modeling, and Therapy. <i>Advanced Biology</i> , 2018, 2, 1800132.	3.0	11
1006	Mutant allele quantification reveals a genetic basis for TP53 mutation-driven castration resistance in prostate cancer cells. <i>Scientific Reports</i> , 2018, 8, 12507.	1.6	5
1007	Efficient generation of goats with defined point mutation (I397V) in GDF9 through CRISPR/Cas9. <i>Reproduction, Fertility and Development</i> , 2018, 30, 307.	0.1	36
1008	Scarless genome editing: progress towards understanding genotype-phenotype relationships. <i>Current Genetics</i> , 2018, 64, 1229-1238.	0.8	6
1009	A Somatically Acquired Enhancer of the Androgen Receptor Is a Noncoding Driver in Advanced Prostate Cancer. <i>Cell</i> , 2018, 174, 422-432.e13.	13.5	234
1010	Practical Recommendations for Improving Efficiency and Accuracy of the CRISPR/Cas9 Genome Editing System. <i>Biochemistry (Moscow)</i> , 2018, 83, 629-642.	0.7	12
1011	Different Methods of Delivering CRISPR/Cas9 Into Cells. <i>Progress in Molecular Biology and Translational Science</i> , 2018, 159, 157-176.	0.9	41
1012	Employing CRISPR/Cas9 genome engineering to dissect the molecular requirements for mitosis. <i>Methods in Cell Biology</i> , 2018, 144, 75-105.	0.5	8
1013	CRISPR therapeutic tools for complex genetic disorders and cancer (Review). <i>International Journal of Oncology</i> , 2018, 53, 443-468.	1.4	28
1014	De novo DNA synthesis using polymerase-nucleotide conjugates. <i>Nature Biotechnology</i> , 2018, 36, 645-650.	9.4	177
1015	CRISPR/Cas9-mediated knock-in of an optimized TetO repeat for live cell imaging of endogenous loci. <i>Nucleic Acids Research</i> , 2018, 46, e100-e100.	6.5	45
1016	CRISPR-Enabled Tools for Engineering Microbial Genomes and Phenotypes. <i>Biotechnology Journal</i> , 2018, 13, e1700586.	1.8	30
1017	Genome-scale identification of cellular pathways required for cell surface recognition. <i>Genome Research</i> , 2018, 28, 1372-1382.	2.4	29
1018	Application of CRISPR-Cas9 for Long Noncoding RNA Genes in Cancer Research. <i>Human Gene Therapy</i> , 2019, 30, 3-9.	1.4	33
1019	Functional Genomics via CRISPR-Cas. <i>Journal of Molecular Biology</i> , 2019, 431, 48-65.	2.0	62

#	ARTICLE	IF	CITATIONS
1020	The advances in CRISPR technology and 3D genome. <i>Seminars in Cell and Developmental Biology</i> , 2019, 90, 54-61.	2.3	10
1021	A genome-scale CRISPR-Cas9 screening in myeloma cells identifies regulators of immunomodulatory drug sensitivity. <i>Leukemia</i> , 2019, 33, 171-180.	3.3	62
1022	PORCN inhibition synergizes with PI3K/mTOR inhibition in Wnt-addicted cancers. <i>Oncogene</i> , 2019, 38, 6662-6677.	2.6	55
1023	CRISPR Interference-Based Platform for Multimodal Genetic Screens in Human iPSC-Derived Neurons. <i>Neuron</i> , 2019, 104, 239-255.e12.	3.8	288
1024	<i>VHL</i> Synthetic Lethality Signatures Uncovered by Genotype-Specific CRISPR-Cas9 Screens. <i>CRISPR Journal</i> , 2019, 2, 230-245.	1.4	8
1025	Identifying chemogenetic interactions from CRISPR screens with drugZ. <i>Genome Medicine</i> , 2019, 11, 52.	3.6	127
1026	CRISPR-Cas9 Probing of Infectious Diseases and Genetic Disorders. <i>Indian Journal of Pediatrics</i> , 2019, 86, 1131-1135.	0.3	1
1027	Strategies to Increase On-Target and Reduce Off-Target Effects of the CRISPR/Cas9 System in Plants. <i>International Journal of Molecular Sciences</i> , 2019, 20, 3719.	1.8	61
1028	CRISPR Tools for Systematic Studies of RNA Regulation. <i>Cold Spring Harbor Perspectives in Biology</i> , 2019, 11, a035386.	2.3	22
1029	A CRISPR-Cas9 screen identifies essential CTCF anchor sites for estrogen receptor-driven breast cancer cell proliferation. <i>Nucleic Acids Research</i> , 2019, 47, 9557-9572.	6.5	21
1030	Systematic Immunotherapy Target Discovery Using Genome-Scale In Vivo CRISPR Screens in CD8 ⁺ T Cells. <i>Cell</i> , 2019, 178, 1189-1204.e23.	13.5	189
1031	Now for the hard ones: is there a limit on CRISPR genome editing in crops?. <i>Journal of Experimental Botany</i> , 2019, 70, 734-737.	2.4	15
1032	Genome mutation after the introduction of the gene editing by electroporation of Cas9 protein (GEEP) system into bovine putative zygotes. <i>In Vitro Cellular and Developmental Biology - Animal</i> , 2019, 55, 598-603.	0.7	22
1033	VISAGE Reveals a Targetable Mitotic Spindle Vulnerability in Cancer Cells. <i>Cell Systems</i> , 2019, 9, 74-92.e8.	2.9	24
1034	CRISPR-Cas9 system: A new-fangled dawn in gene editing. <i>Life Sciences</i> , 2019, 232, 116636.	2.0	160
1035	Pre-existing H4K16ac levels in euchromatin drive DNA repair by homologous recombination in S-phase. <i>Communications Biology</i> , 2019, 2, 253.	2.0	33
1036	Evaluating the Efficiency of gRNAs in CRISPR/Cas9 Mediated Genome Editing in Poplars. <i>International Journal of Molecular Sciences</i> , 2019, 20, 3623.	1.8	43
1037	Optimizing Systems for Cas9 Expression in <i>Toxoplasma gondii</i> . <i>MSphere</i> , 2019, 4, .	1.3	39

#	ARTICLE	IF	CITATIONS
1038	Mammalian synthetic biology by CRISPRs engineering and applications. <i>Current Opinion in Chemical Biology</i> , 2019, 52, 79-84.	2.8	7
1039	Long-term expansion and differentiation of adult murine epidermal stem cells in 3D organoid cultures. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2019, 116, 14630-14638.	3.3	56
1040	Functional interrogation of Lynch syndrome-associated <i>MSH2</i> missense variants via CRISPR-Cas9 gene editing in human embryonic stem cells. <i>Human Mutation</i> , 2019, 40, 2044-2056.	1.1	31
1041	Targeted genetic screening in mice through haploid embryonic stem cells identifies critical genes in bone development. <i>PLoS Biology</i> , 2019, 17, e3000350.	2.6	15
1042	Optical Pooled Screens in Human Cells. <i>Cell</i> , 2019, 179, 787-799.e17.	13.5	170
1043	Simple and Efficient Targeted Intracellular Protein Delivery with Self-Assembled Nanovehicles for Effective Cancer Therapy. <i>Advanced Functional Materials</i> , 2019, 29, 1906187.	7.8	24
1046	IRF2 is a master regulator of human keratinocyte stem cell fate. <i>Nature Communications</i> , 2019, 10, 4676.	5.8	25
1047	CRISPR-Cas9-mediated loss-of-function screens. <i>Frontiers in Life Science: Frontiers of Interdisciplinary Research in the Life Sciences</i> , 2019, 12, 1-13.	1.1	3
1048	A one-step tRNA-CRISPR system for genome-wide genetic interaction mapping in mammalian cells. <i>Scientific Reports</i> , 2019, 9, 14499.	1.6	7
1049	CRISPR-Cas9 Screens Identify the RNA Helicase DDX3X as a Repressor of C9ORF72 (GGGGCC) _n Repeat-Associated Non-AUG Translation. <i>Neuron</i> , 2019, 104, 885-898.e8.	3.8	107
1050	The MTH1 inhibitor TH588 is a microtubule-modulating agent that eliminates cancer cells by activating the mitotic surveillance pathway. <i>Scientific Reports</i> , 2019, 9, 14667.	1.6	19
1052	Prediction of off-target specificity and cell-specific fitness of CRISPR-Cas System using attention boosted deep learning and network-based gene feature. <i>PLoS Computational Biology</i> , 2019, 15, e1007480.	1.5	41
1053	Pooled CRISPR Screens in Drosophila Cells. <i>Current Protocols in Molecular Biology</i> , 2019, 129, e111.	2.9	13
1054	Misc. medical devices and technologies. <i>Side Effects of Drugs Annual</i> , 2019, , 573-615.	0.6	0
1055	Enhanced scale and scope of genome engineering and regulation using CRISPR/Cas in <i>Saccharomyces cerevisiae</i> . <i>FEMS Yeast Research</i> , 2019, 19, .	1.1	11
1056	SpCas9 activity prediction by DeepSpCas9, a deep learning-based model with high generalization performance. <i>Science Advances</i> , 2019, 5, eaax9249.	4.7	130
1057	Identification of DHODH as a therapeutic target in small cell lung cancer. <i>Science Translational Medicine</i> , 2019, 11, .	5.8	89
1058	A Compendium of Genetic Modifiers of Mitochondrial Dysfunction Reveals Intra-organelle Buffering. <i>Cell</i> , 2019, 179, 1222-1238.e17.	13.5	109

#	ARTICLE	IF	CITATIONS
1059	Pooled CRISPR-Based Genetic Screens in Mammalian Cells. <i>Journal of Visualized Experiments</i> , 2019, , .	0.2	9
1060	Lipopeptide-Based Nanosome-Mediated Delivery of Hyperaccurate CRISPR/Cas9 Ribonucleoprotein for Gene Editing. <i>Small</i> , 2019, 15, e1903172.	5.2	10
1061	The Relationship between Embryonic Development and the Efficiency of Target Mutations in Porcine Endogenous Retroviruses (PERVs) Pol Genes in Porcine Embryos. <i>Animals</i> , 2019, 9, 593.	1.0	9
1062	Targeted gene therapy in human-induced pluripotent stem cells from a patient with primary hyperoxaluria type 1 using CRISPR/Cas9 technology. <i>Biochemical and Biophysical Research Communications</i> , 2019, 517, 677-683.	1.0	17
1063	A CRISPR platform for targeted in vivo screens identifies <i>Toxoplasma gondii</i> virulence factors in mice. <i>Nature Communications</i> , 2019, 10, 3963.	5.8	56
1064	The conditional nature of gene essentiality. <i>Current Opinion in Genetics and Development</i> , 2019, 58-59, 55-61.	1.5	21
1065	Genomically informed small-molecule drugs overcome resistance to a sustained-release formulation of an engineered death receptor agonist in patient-derived tumor models. <i>Science Advances</i> , 2019, 5, eaaw9162.	4.7	11
1066	Guide RNA modification as a way to improve CRISPR/Cas9-based genome-editing systems. <i>Biochimie</i> , 2019, 167, 49-60.	1.3	45
1067	mTORC1 Activation Requires DRAM-1 by Facilitating Lysosomal Amino Acid Efflux. <i>Molecular Cell</i> , 2019, 76, 163-176.e8.	4.5	37
1068	Targeted delivery of CRISPR interference system against <i>Fabp4</i> to white adipocytes ameliorates obesity, inflammation, hepatic steatosis, and insulin resistance. <i>Genome Research</i> , 2019, 29, 1442-1452.	2.4	54
1069	A benchmark of computational CRISPR-Cas9 guide design methods. <i>PLoS Computational Biology</i> , 2019, 15, e1007274.	1.5	27
1070	Deep sequencing analysis of CRISPR/Cas9 induced mutations by two delivery methods in target model genes and the CENH3 region of red cabbage (<i>Brassica oleracea</i> var. <i>capitata</i> f. <i>rubra</i>). <i>Plant Cell, Tissue and Organ Culture</i> , 2019, 139, 227-235.	1.2	18
1071	Mitigation of off-target toxicity in CRISPR-Cas9 screens for essential non-coding elements. <i>Nature Communications</i> , 2019, 10, 4063.	5.8	104
1072	Genome-scale CRISPR knockout screen identifies TIGAR as a modifier of PARP inhibitor sensitivity. <i>Communications Biology</i> , 2019, 2, 335.	2.0	35
1073	Unique and Shared Epigenetic Programs of the CREBBP and EP300 Acetyltransferases in Germinal Center B Cells Reveal Targetable Dependencies in Lymphoma. <i>Immunity</i> , 2019, 51, 535-547.e9.	6.6	93
1074	Genetically Engineered Mouse Models of Gliomas: Technological Developments for Translational Discoveries. <i>Cancers</i> , 2019, 11, 1335.	1.7	31
1075	Optimized CRISPR guide RNA design for two high-fidelity Cas9 variants by deep learning. <i>Nature Communications</i> , 2019, 10, 4284.	5.8	163
1076	Enhanced SLAMF7 Homotypic Interactions by Elotuzumab Improves NK Cell Killing of Multiple Myeloma. <i>Cancer Immunology Research</i> , 2019, 7, 1633-1646.	1.6	26

#	ARTICLE	IF	CITATIONS
1077	Enhanced CRISPR-based DNA demethylation by Casilio-ME-mediated RNA-guided coupling of methylcytosine oxidation and DNA repair pathways. <i>Nature Communications</i> , 2019, 10, 4296.	5.8	41
1078	Systematic Identification of Host Cell Regulators of <i>Legionella pneumophila</i> Pathogenesis Using a Genome-wide CRISPR Screen. <i>Cell Host and Microbe</i> , 2019, 26, 551-563.e6.	5.1	62
1079	CRISPR technologies for stem cell engineering and regenerative medicine. <i>Biotechnology Advances</i> , 2019, 37, 107447.	6.0	59
1080	Strategies for Applying Nonhomologous End Joining-Mediated Genome Editing in Prokaryotes. <i>ACS Synthetic Biology</i> , 2019, 8, 2194-2202.	1.9	8
1081	A new chemical approach for proximity labelling of chromatin-associated RNAs and proteins with visible light irradiation. <i>Chemical Communications</i> , 2019, 55, 12340-12343.	2.2	15
1082	Mapping human cell phenotypes to genotypes with single-cell genomics. <i>Science</i> , 2019, 365, 1401-1405.	6.0	71
1083	Targeted genomic CRISPR-Cas9 screen identifies MAP4K4 as essential for glioblastoma invasion. <i>Scientific Reports</i> , 2019, 9, 14020.	1.6	38
1084	Effective editing for lysophosphatidic acid acyltransferase 2/5 in allotetraploid rapeseed (<i>Brassica</i>) Tj ETQq1 1 0.784314 rgBT/Overlook	6.2	43
1085	Development and characterization of a CRISPR/Cas9n-based multiplex genome editing system for <i>Bacillus subtilis</i> . <i>Biotechnology for Biofuels</i> , 2019, 12, 197.	6.2	55
1086	Large-Scale "OMICs" Studies to Explore the Physiopathology of HIV-1 Infection. <i>Frontiers in Genetics</i> , 2019, 10, 799.	1.1	8
1087	De novo identification of essential protein domains from CRISPR-Cas9 tiling-sgRNA knockout screens. <i>Nature Communications</i> , 2019, 10, 4541.	5.8	44
1088	A CRISPR Screen Identifies LPTM4A and TM9SF Proteins as Glycolipid-Regulating Factors. <i>Science</i> , 2019, 11, 409-424.	1.9	53
1089	CRISPR-Cas: a tool for cancer research and therapeutics. <i>Nature Reviews Clinical Oncology</i> , 2019, 16, 281-295.	12.5	127
1090	Head and Neck Tumors. , 2019, , 627-762.		0
1091	sgRNA Sequence Motifs Blocking Efficient CRISPR/Cas9-Mediated Gene Editing. <i>Cell Reports</i> , 2019, 26, 1098-1103.e3.	2.9	92
1092	The prokaryotic Argonaute proteins enhance homology sequence-directed recombination in bacteria. <i>Nucleic Acids Research</i> , 2019, 47, 3568-3579.	6.5	42
1093	CRISPR-Based Tools in Immunity. <i>Annual Review of Immunology</i> , 2019, 37, 571-597.	9.5	38
1094	Integrative analysis of pooled CRISPR genetic screens using MAGeCKFlute. <i>Nature Protocols</i> , 2019, 14, 756-780.	5.5	260

#	ARTICLE	IF	CITATIONS
1095	Knockout of proteolytic key regulators in malignant peripheral nerve sheath tumor cells by CRISPR/Cas9. <i>Journal of Cellular Biotechnology</i> , 2019, 4, 5-13.	0.1	1
1096	Guide RNAs with embedded barcodes boost CRISPR-pooled screens. <i>Genome Biology</i> , 2019, 20, 20.	3.8	50
1097	JACKS: joint analysis of CRISPR/Cas9 knockout screens. <i>Genome Research</i> , 2019, 29, 464-471.	2.4	64
1098	Design and Assembly of CRISPR/Cas9 Lentiviral and rAAV Vectors for Targeted Genome Editing. <i>Methods in Molecular Biology</i> , 2019, 1937, 29-45.	0.4	4
1099	Progress and Challenges for Live-cell Imaging of Genomic Loci Using CRISPR-based Platforms. <i>Genomics, Proteomics and Bioinformatics</i> , 2019, 17, 119-128.	3.0	69
1100	The circadian E3 ligase complex SCFFBXL3+CRY targets TLK2. <i>Scientific Reports</i> , 2019, 9, 198.	1.6	26
1101	Editing the Central Nervous System Through CRISPR/Cas9 Systems. <i>Frontiers in Molecular Neuroscience</i> , 2019, 12, 110.	1.4	31
1102	Prediction of activity and specificity of CRISPR-Cpf1 using convolutional deep learning neural networks. <i>BMC Bioinformatics</i> , 2019, 20, 332.	1.2	32
1103	Towards the Integration of Metabolic Network Modelling and Machine Learning for the Routine Analysis of High-Throughput Patient Data. <i>Computational Biology</i> , 2019, , 401-424.	0.1	0
1104	A simplified transposon mutagenesis method to perform phenotypic forward genetic screens in cultured cells. <i>BMC Genomics</i> , 2019, 20, 497.	1.2	5
1105	An undergraduate laboratory module that uses the CRISPR/Cas9 system to generate frameshift mutations in yeast. <i>Biochemistry and Molecular Biology Education</i> , 2019, 47, 573-580.	0.5	5
1106	CRISPR/Cas9 guided genome and epigenome engineering and its therapeutic applications in immune mediated diseases. <i>Seminars in Cell and Developmental Biology</i> , 2019, 96, 32-43.	2.3	9
1107	A germline mutation in Rab43 gene identified from a cancer family predisposes to a hereditary liver-colon cancer syndrome. <i>BMC Cancer</i> , 2019, 19, 613.	1.1	4
1108	Delivery of CRISPR/Cas9 for therapeutic genome editing. <i>Journal of Gene Medicine</i> , 2019, 21, e3107.	1.4	93
1109	FOXA1 mutations alter pioneering activity, differentiation and prostate cancer phenotypes. <i>Nature</i> , 2019, 571, 408-412.	13.7	163
1110	Development of CRISPR-Cas systems for genome editing and beyond. <i>Quarterly Reviews of Biophysics</i> , 2019, 52, .	2.4	108
1111	A CRISPR/Cas9 screen identifies the histone demethylase MINA53 as a novel HIV-1 latency-promoting gene (LPG). <i>Nucleic Acids Research</i> , 2019, 47, 7333-7347.	6.5	35
1112	Cas9 Ribonucleoprotein Complex Delivery: Methods and Applications for Neuroinflammation. <i>Journal of NeuroImmune Pharmacology</i> , 2019, 14, 565-577.	2.1	10

#	ARTICLE	IF	CITATIONS
1113	A novel model of controlling PD-L1 expression in ALK+ anaplastic large cell lymphoma revealed by CRISPR screening. <i>Blood</i> , 2019, 134, 171-185.	0.6	47
1114	Systematic Analysis of Drug Vulnerabilities Conferred by Tumor Suppressor Loss. <i>Cell Reports</i> , 2019, 27, 3331-3344.e6.	2.9	19
1115	Large scale control and programming of gene expression using CRISPR. <i>Seminars in Cell and Developmental Biology</i> , 2019, 96, 124-132.	2.3	5
1116	The next generation of CRISPR-Cas technologies and applications. <i>Nature Reviews Molecular Cell Biology</i> , 2019, 20, 490-507.	16.1	957
1117	A screening method to identify efficient sgRNAs in Arabidopsis, used in conjunction with cell-specific lignin reduction. <i>Biotechnology for Biofuels</i> , 2019, 12, 130.	6.2	39
1118	Advancements in CRISPR/Cas9 technology-Focusing on cancer therapeutics and beyond. <i>Seminars in Cell and Developmental Biology</i> , 2019, 96, 13-21.	2.3	19
1119	Best practice for CRISPR design using current tools and resources. <i>Methods</i> , 2019, 164-165, 3-17.	1.9	9
1120	Plant Virus Vectors 3.0: Transitioning into Synthetic Genomics. <i>Annual Review of Phytopathology</i> , 2019, 57, 211-230.	3.5	51
1121	Model-based understanding of single-cell CRISPR screening. <i>Nature Communications</i> , 2019, 10, 2233.	5.8	61
1122	Genome-scale drop-out screens to identify cancer cell vulnerabilities in AML. <i>Current Opinion in Genetics and Development</i> , 2019, 54, 83-87.	1.5	3
1123	A White-Box Machine Learning Approach for Revealing Antibiotic Mechanisms of Action. <i>Cell</i> , 2019, 177, 1649-1661.e9.	13.5	227
1124	Sox17 is required for endothelial regeneration following inflammation-induced vascular injury. <i>Nature Communications</i> , 2019, 10, 2126.	5.8	104
1125	Tissue-specific (ts)CRISPR as an efficient strategy for in vivo screening in Drosophila. <i>Nature Communications</i> , 2019, 10, 2113.	5.8	84
1126	A CRISPR Screen Using Subtilase Cytotoxin Identifies SLC39A9 as a Glycan-Regulating Factor. <i>IScience</i> , 2019, 15, 407-420.	1.9	34
1127	A comprehensive search of functional sequence space using large mammalian display libraries created by gene editing. <i>MAbs</i> , 2019, 11, 884-898.	2.6	38
1128	Imaging-based pooled CRISPR screening reveals regulators of lncRNA localization. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2019, 116, 10842-10851.	3.3	79
1129	A functional CRISPR/Cas9 screen identifies kinases that modulate FGFR inhibitor response in gastric cancer. <i>Oncogenesis</i> , 2019, 8, 33.	2.1	18
1130	CRISPR/Cas9 as a tool to dissect cancer mutations. <i>Methods</i> , 2019, 164-165, 36-48.	1.9	5

#	ARTICLE	IF	CITATIONS
1131	ExonÂ2 skipping eliminates Î³â€glutamyl carboxylase activity, indicating a partial splicing defect in a patient with vitaminÂK clotting factor deficiency. <i>Journal of Thrombosis and Haemostasis</i> , 2019, 17, 1053-1063.	1.9	3
1132	Convolution neural network model for predicting single guide RNA efficiency in CRISPR/Cas9 system. <i>Chemometrics and Intelligent Laboratory Systems</i> , 2019, 189, 149-154.	1.8	6
1133	TAF5L and TAF6L Maintain Self-Renewal of Embryonic Stem Cells via the MYC Regulatory Network. <i>Molecular Cell</i> , 2019, 74, 1148-1163.e7.	4.5	36
1134	Guidelines for optimized gene knockout using CRISPR/Cas9. <i>BioTechniques</i> , 2019, 66, 295-302.	0.8	34
1135	Discovery of a stable expression hot spot in the genome of Chinese hamster ovary cells using lentivirus-based random integration. <i>Biotechnology and Biotechnological Equipment</i> , 2019, 33, 605-612.	0.5	10
1136	krCRISPR: an easy and efficient strategy for generating conditional knockout of essential genes in cells. <i>Journal of Biological Engineering</i> , 2019, 13, 35.	2.0	24
1137	Beta-binomial modeling of CRISPR pooled screen data identifies target genes with greater sensitivity and fewer false negatives. <i>Genome Research</i> , 2019, 29, 999-1008.	2.4	32
1138	Molecular dissection of box jellyfish venom cytotoxicity highlights an effective venom antidote. <i>Nature Communications</i> , 2019, 10, 1655.	5.8	35
1139	Measuring sequencer size bias using REcount: a novel method for highly accurate Illumina sequencing-based quantification. <i>Genome Biology</i> , 2019, 20, 85.	3.8	29
1140	RB constrains lineage fidelity and multiple stages of tumour progression and metastasis. <i>Nature</i> , 2019, 569, 423-427.	13.7	62
1141	HOX Loci Focused CRISPR/sgRNA Library Screening Identifying Critical CTCF Boundaries. <i>Journal of Visualized Experiments</i> , 2019, , .	0.2	3
1142	Genome-Wide CRISPR-Cas9 Screens Expose Genetic Vulnerabilities and Mechanisms of Temozolomide Sensitivity in Glioblastoma Stem Cells. <i>Cell Reports</i> , 2019, 27, 971-986.e9.	2.9	139
1143	Unified energetics analysis unravels SpCas9 cleavage activity for optimal gRNA design. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2019, 116, 8693-8698.	3.3	46
1144	CRISPRâ€Cas ribonucleoprotein mediated homology-directed repair for efficient targeted genome editing in microalgae <i>Nannochloropsis oceanica</i> IMET1. <i>Biotechnology for Biofuels</i> , 2019, 12, 66.	6.2	66
1145	Genome-wide CRISPR-Cas9 screening in mammalian cells. <i>Methods</i> , 2019, 164-165, 29-35.	1.9	49
1146	CRISPR genomic screening informs geneâ€environment interactions. <i>Current Opinion in Toxicology</i> , 2019, 18, 46-53.	2.6	6
1147	Evaluating and Enhancing Target Specificity of Gene-Editing Nucleases and Deaminases. <i>Annual Review of Biochemistry</i> , 2019, 88, 191-220.	5.0	120
1148	CHP1 Regulates Compartmentalized Glycerolipid Synthesis by Activating GPAT4. <i>Molecular Cell</i> , 2019, 74, 45-58.e7.	4.5	83

#	ARTICLE	IF	CITATIONS
1149	Site-specific integration of light chain and heavy chain genes of antibody into CHO-K1 stable hot spot and detection of antibody and fusion protein expression level. <i>Preparative Biochemistry and Biotechnology</i> , 2019, 49, 384-390.	1.0	11
1150	CRISPR/Cas9-mediated genome editing of splicing mutation causing congenital hearing loss. <i>Gene</i> , 2019, 703, 83-90.	1.0	6
1151	PRMT1 loss sensitizes cells to PRMT5 inhibition. <i>Nucleic Acids Research</i> , 2019, 47, 5038-5048.	6.5	69
1152	CRISPR-Cas in <i>Streptococcus pyogenes</i> . <i>RNA Biology</i> , 2019, 16, 380-389.	1.5	86
1153	Spindle Assembly Checkpoint Inhibition Can Resensitize p53-Null Stem Cells to Cancer Chemotherapy. <i>Cancer Research</i> , 2019, 79, 2392-2403.	0.4	14
1154	Single-Cell Heterogeneity Analysis and CRISPR Screen Identify Key $\hat{2}$ -Cell-Specific Disease Genes. <i>Cell Reports</i> , 2019, 26, 3132-3144.e7.	2.9	90
1155	A KLF6-driven transcriptional network links lipid homeostasis and tumour growth in renal carcinoma. <i>Nature Communications</i> , 2019, 10, 1152.	5.8	60
1156	Genome-Wide RNAi Screen Identifies PMPCB as a Therapeutic Vulnerability in EpCAM+ Hepatocellular Carcinoma. <i>Cancer Research</i> , 2019, 79, 2379-2391.	0.4	19
1157	A Practical Guide to Genome Editing Using Targeted Nuclease Technologies. , 2019, 9, 665-714.		7
1158	LION: a simple and rapid method to achieve CRISPR gene editing. <i>Cellular and Molecular Life Sciences</i> , 2019, 76, 2633-2645.	2.4	3
1159	Multiplexed Cas9 targeting reveals genomic location effects and gRNA-based staggered breaks influencing mutation efficiency. <i>Nature Communications</i> , 2019, 10, 1598.	5.8	50
1160	<i>Anxa2</i> and <i>Ctsd</i> knockout CHO cell lines to diminish the risk of contamination with host cell proteins. <i>Biotechnology Progress</i> , 2019, 35, e2820.	1.3	16
1161	In-vitro dissolution and microbial inhibition studies on anticancer drug etoposide with $\hat{2}$ -cyclodextrin. <i>Materials Science and Engineering C</i> , 2019, 102, 96-105.	3.8	25
1162	Advancements and Obstacles of CRISPR-Cas9 Technology in Translational Research. <i>Molecular Therapy - Methods and Clinical Development</i> , 2019, 13, 359-370.	1.8	74
1163	Essential Gene Profiles for Human Pluripotent Stem Cells Identify Uncharacterized Genes and Substrate Dependencies. <i>Cell Reports</i> , 2019, 27, 599-615.e12.	2.9	85
1164	Prioritization of cancer therapeutic targets using CRISPR-Cas9 screens. <i>Nature</i> , 2019, 568, 511-516.	13.7	886
1165	Liver Cancer Gene Discovery Using Gene Targeting, Sleeping Beauty, and CRISPR/Cas9. <i>Seminars in Liver Disease</i> , 2019, 39, 261-274.	1.8	21
1166	Near-infrared upconversion-activated CRISPR-Cas9 system: A remote-controlled gene editing platform. <i>Science Advances</i> , 2019, 5, eaav7199.	4.7	198

#	ARTICLE	IF	CITATIONS
1167	Disruptive Technology: CRISPR/Cas-Based Tools and Approaches. <i>Molecular Diagnosis and Therapy</i> , 2019, 23, 187-200.	1.6	22
1168	Functional-genetic approaches to understanding drug response and resistance. <i>Current Opinion in Genetics and Development</i> , 2019, 54, 41-47.	1.5	3
1169	Identification of a Xist silencing domain by Tiling CRISPR. <i>Scientific Reports</i> , 2019, 9, 2408.	1.6	17
1170	Overcoming BET Inhibitor Resistance in Malignant Peripheral Nerve Sheath Tumors. <i>Clinical Cancer Research</i> , 2019, 25, 3404-3416.	3.2	21
1171	Identification of Novel Regulatory Genes in APAP Induced Hepatocyte Toxicity by a Genome-Wide CRISPR-Cas9 Screen. <i>Scientific Reports</i> , 2019, 9, 1396.	1.6	8
1172	Folliculin regulates mTORC1/2 and WNT pathways in early human pluripotency. <i>Nature Communications</i> , 2019, 10, 632.	5.8	47
1173	Interaction of the Host and Viral Genome and Their Influence on HIV Disease. <i>Frontiers in Genetics</i> , 2018, 9, 720.	1.1	24
1174	Genome-scale CRISPR/Cas9 Screening Reveals Squalene Epoxidase as a Susceptibility Factor for Cytotoxicity of Malformin. <i>ChemBioChem</i> , 2019, 20, 1563-1568.	1.3	1
1175	Tracing cellular heterogeneity in pooled genetic screens via multi-level barcoding. <i>BMC Genomics</i> , 2019, 20, 107.	1.2	15
1176	Motor neuron disease-associated loss of nuclear TDP-43 is linked to DNA double-strand break repair defects. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2019, 116, 4696-4705.	3.3	203
1177	Structural rearrangements generate cell-specific, gene-independent CRISPR-Cas9 loss of fitness effects. <i>Genome Biology</i> , 2019, 20, 27.	3.8	35
1179	Genome-Wide CRISPR Screening Identifies JAK1 Deficiency as a Mechanism of T-Cell Resistance. <i>Frontiers in Immunology</i> , 2019, 10, 251.	2.2	17
1180	Horizon scanning for novel and emerging in vitro mammalian cell mutagenicity test systems. <i>Mutation Research - Genetic Toxicology and Environmental Mutagenesis</i> , 2019, 847, 403024.	0.9	3
1181	Protocols for CRISPR-Cas9 Screening in Lymphoma Cell Lines. <i>Methods in Molecular Biology</i> , 2019, 1956, 337-350.	0.4	11
1182	Systematic Dissection of the Metabolic-Apoptotic Interface in AML Reveals Heme Biosynthesis to Be a Regulator of Drug Sensitivity. <i>Cell Metabolism</i> , 2019, 29, 1217-1231.e7.	7.2	75
1183	Beyond classic editing: innovative CRISPR approaches for functional studies of long non-coding RNA. <i>Biology Methods and Protocols</i> , 2019, 4, bpz017.	1.0	16
1184	Scan $\langle i \rangle B \langle /i \rangle$ -statistic for kernel change-point detection. <i>Sequential Analysis</i> , 2019, 38, 503-544.	0.2	14
1185	Breeding of Indica glutinous cytoplasmic male sterile line WX209A via CRISPR/Cas9 mediated genomic editing. <i>Czech Journal of Genetics and Plant Breeding</i> , 2019, 55, 93-100.	0.4	5

#	ARTICLE	IF	CITATIONS
1186	Genome-wide CRISPR screens reveal genetic mediators of cereblon modulator toxicity in primary effusion lymphoma. <i>Blood Advances</i> , 2019, 3, 2105-2117.	2.5	24
1188	Genome editing and selection based on genes associated with sports athletic performance. <i>Synthesis Philosophica</i> , 2019, 34, 323-340.	0.1	2
1189	Application of CRISPR genetic screens to investigate neurological diseases. <i>Molecular Neurodegeneration</i> , 2019, 14, 41.	4.4	25
1190	Highly Efficient CRISPR-Cas9-Based Methods for Generating Deletion Mutations and F0 Embryos that Lack Gene Function in Zebrafish. <i>Developmental Cell</i> , 2019, 51, 645-657.e4.	3.1	188
1191	Conditional depletion of the RNA polymerase I subunit PAF53 reveals that it is essential for mitosis and enables identification of functional domains. <i>Journal of Biological Chemistry</i> , 2019, 294, 19907-19922.	1.6	8
1192	Chemogenetic interactions in human cancer cells. <i>Computational and Structural Biotechnology Journal</i> , 2019, 17, 1318-1325.	1.9	8
1193	Agreement between two large pan-cancer CRISPR-Cas9 gene dependency data sets. <i>Nature Communications</i> , 2019, 10, 5817.	5.8	160
1194	CRISPR-Switch regulates sgRNA activity by Cre recombination for sequential editing of two loci. <i>Nature Communications</i> , 2019, 10, 5454.	5.8	31
1195	The Hyaluronidase, TMEM2, Promotes ER Homeostasis and Longevity Independent of the UPRER. <i>Cell</i> , 2019, 179, 1306-1318.e18.	13.5	87
1197	The Oncogenic Kaposi's Sarcoma-Associated Herpesvirus Encodes a Mimic of the Tumor-Suppressive miR-15/16 miRNA Family. <i>Cell Reports</i> , 2019, 29, 2961-2969.e6.	2.9	14
1198	Effective CRISPR interference of an endogenous gene via a single transgene in mice. <i>Scientific Reports</i> , 2019, 9, 17312.	1.6	25
1199	Advancing CRISPR-Based Programmable Platforms beyond Genome Editing in Mammalian Cells. <i>ACS Synthetic Biology</i> , 2019, 8, 2607-2619.	1.9	5
1200	A view on drug resistance in cancer. <i>Nature</i> , 2019, 575, 299-309.	13.7	1,391
1201	Improving CRISPR guide design with consensus approaches. <i>BMC Genomics</i> , 2019, 20, 931.	1.2	6
1202	Benchmarking network algorithms for contextualizing genes of interest. <i>PLoS Computational Biology</i> , 2019, 15, e1007403.	1.5	7
1204	A genome-scale CRISPR/Cas9 knockout screening reveals SH3D21 as a sensitizer for gemcitabine. <i>Scientific Reports</i> , 2019, 9, 19188.	1.6	8
1205	PASTMUS: mapping functional elements at single amino acid resolution in human cells. <i>Genome Biology</i> , 2019, 20, 279.	3.8	6
1206	Multiplexed activation of endogenous genes by CRISPRa elicits potent antitumor immunity. <i>Nature Immunology</i> , 2019, 20, 1494-1505.	7.0	83

#	ARTICLE	IF	CITATIONS
1207	Coupling chemical mutagenesis to next generation sequencing for the identification of drug resistance mutations in <i>Leishmania</i> . <i>Nature Communications</i> , 2019, 10, 5627.	5.8	37
1208	CRISPRLearner: A Deep Learning-Based System to Predict CRISPR/Cas9 sgRNA On-Target Cleavage Efficiency. <i>Electronics (Switzerland)</i> , 2019, 8, 1478.	1.8	18
1209	“What's Past is Prologue” Pre-Existing Epigenetic Transcriptional Marks May Also Influence DNA Repair Pathway Choice. <i>Radiation Research</i> , 2019, 192, 577.	0.7	1
1210	Screening Strategies and Methods for Better Off-Target Liability Prediction and Identification of Small-Molecule Pharmaceuticals. <i>SLAS Discovery</i> , 2019, 24, 1-24.	1.4	42
1211	Genome-wide approaches to unravelling host-virus interactions in Dengue and Zika infections. <i>Current Opinion in Virology</i> , 2019, 34, 29-38.	2.6	6
1212	Toward a better understanding of folate metabolism in health and disease. <i>Journal of Experimental Medicine</i> , 2019, 216, 253-266.	4.2	109
1213	A FACS-Based Genome-wide CRISPR Screen Reveals a Requirement for COPI in <i>Chlamydia trachomatis</i> Invasion. <i>IScience</i> , 2019, 11, 71-84.	1.9	21
1214	Targeted cytochrome P450 3045C1 (CYP3045C1) gene mutation via CRISPR-Cas9 ribonucleoproteins in the marine rotifer <i>Brachionus koreanus</i> . <i>Hydrobiologia</i> , 2019, 844, 117-128.	1.0	6
1215	CRISPR/Cas9-Based Positive Screens for Cancer-Related Traits. <i>Methods in Molecular Biology</i> , 2019, 1907, 137-144.	0.4	4
1216	Modeling Human Digestive Diseases With CRISPR-Cas9 Modified Organoids. <i>Gastroenterology</i> , 2019, 156, 562-576.	0.6	104
1217	Predicting the mutations generated by repair of Cas9-induced double-strand breaks. <i>Nature Biotechnology</i> , 2019, 37, 64-72.	9.4	359
1218	The BioGRID interaction database: 2019 update. <i>Nucleic Acids Research</i> , 2019, 47, D529-D541.	6.5	1,096
1219	Approaches to identify extracellular receptor-ligand interactions. <i>Current Opinion in Structural Biology</i> , 2019, 56, 28-36.	2.6	16
1220	Recent Advances in CRISPR/Cas9-Mediated Genome Editing in <i>Dictyostelium</i> . <i>Cells</i> , 2019, 8, 46.	1.8	12
1221	CREBBP/EP300 Bromodomain Inhibition Affects the Proliferation of AR-Positive Breast Cancer Cell Lines. <i>Molecular Cancer Research</i> , 2019, 17, 720-730.	1.5	24
1222	CRISPR-DT: designing gRNAs for the CRISPR-Cpf1 system with improved target efficiency and specificity. <i>Bioinformatics</i> , 2019, 35, 2783-2789.	1.8	62
1223	Viral Delivery Systems for CRISPR. <i>Viruses</i> , 2019, 11, 28.	1.5	174
1224	Programmable Molecular Scissors: Applications of a New Tool for Genome Editing in Biotech. <i>Molecular Therapy - Nucleic Acids</i> , 2019, 14, 212-238.	2.3	41

#	ARTICLE	IF	CITATIONS
1225	Material solutions for delivery of CRISPR/Cas-based genome editing tools: Current status and future outlook. <i>Materials Today</i> , 2019, 26, 40-66.	8.3	89
1226	CRISPRâ€“Cas9 a boon or bane: the bumpy road ahead to cancer therapeutics. <i>Cancer Cell International</i> , 2019, 19, 12.	1.8	46
1228	CRISPR/Cas9-Based Gene Dropout Screens. <i>Methods in Molecular Biology</i> , 2019, 1881, 185-200.	0.4	1
1229	Triple deletion of <i>clpC</i> , <i>porB</i> , and <i>mepA</i> enhances production of small ubiquitin-like modifier-N-terminal pro-brain natriuretic peptide in <i>Corynebacterium glutamicum</i> . <i>Journal of Industrial Microbiology and Biotechnology</i> , 2019, 46, 67-79.	1.4	16
1230	Efficient CRISPR/Cas9-Mediated Mutagenesis in Primary Murine T Lymphocytes. <i>Current Protocols in Immunology</i> , 2019, 124, e62.	3.6	13
1231	Brain Tumor Stem Cells. <i>Methods in Molecular Biology</i> , 2019, , .	0.4	2
1232	Pooled Lentiviral CRISPR-Cas9 Screens for Functional Genomics in Mammalian Cells. <i>Methods in Molecular Biology</i> , 2019, 1869, 169-188.	0.4	25
1234	Target-Specific Precision of CRISPR-Mediated Genome Editing. <i>Molecular Cell</i> , 2019, 73, 699-713.e6.	4.5	183
1235	Genome-Wide CRISPR/Cas9 Screening for Identification of Cancer Genes in Cell Lines. <i>Methods in Molecular Biology</i> , 2019, 1907, 125-136.	0.4	16
1236	A Road Map to Personalizing Targeted Cancer Therapies Using Synthetic Lethality. <i>Trends in Cancer</i> , 2019, 5, 11-29.	3.8	21
1237	Exome Sequencing of Drug-Resistant Clones for Target Identification. <i>Methods in Molecular Biology</i> , 2019, 1888, 175-187.	0.4	4
1238	Functional Genomics for Cancer Research: Applications In Vivo and In Vitro. <i>Annual Review of Cancer Biology</i> , 2019, 3, 345-363.	2.3	9
1239	CRISPRâ€“Cas molecular beacons as tool for studies of assembly of CRISPRâ€“Cas effector complexes and their interactions with DNA. <i>Methods in Enzymology</i> , 2019, 616, 337-363.	0.4	6
1240	Prediction of CRISPR sgRNA Activity Using a Deep Convolutional Neural Network. <i>Journal of Chemical Information and Modeling</i> , 2019, 59, 615-624.	2.5	64
1241	CRISPR-Local: a local single-guide RNA (sgRNA) design tool for non-reference plant genomes. <i>Bioinformatics</i> , 2019, 35, 2501-2503.	1.8	28
1243	Deconvoluting essential gene signatures for cancer growth from genomic expression in compound-treated cells. <i>Bioinformatics</i> , 2019, 35, 1167-1173.	1.8	2
1244	Yeast genetic interaction screens in the age of CRISPR/Cas. <i>Current Genetics</i> , 2019, 65, 307-327.	0.8	29
1245	Fluorescence Activated Cell Sorting (FACS) in Genome-Wide Genetic Screening of Membrane Trafficking. <i>Current Protocols in Cell Biology</i> , 2019, 82, e68.	2.3	7

#	ARTICLE	IF	CITATIONS
1246	Big data management challenges in health research—a literature review. <i>Briefings in Bioinformatics</i> , 2019, 20, 156-167.	3.2	56
1247	Understanding the disease genome: gene essentiality and the interplay of selection, recombination and mutation. <i>Briefings in Bioinformatics</i> , 2019, 20, 267-273.	3.2	11
1248	The application of CRISPR-Cas9 genome editing tool in cancer immunotherapy. <i>Briefings in Functional Genomics</i> , 2019, 18, 129-132.	1.3	13
1249	EBWS: Essential Bioinformatics Web Services for Sequence Analyses. <i>IEEE/ACM Transactions on Computational Biology and Bioinformatics</i> , 2019, 16, 942-953.	1.9	11
1250	New insights into RAS biology reinvigorate interest in mathematical modeling of RAS signaling. <i>Seminars in Cancer Biology</i> , 2019, 54, 162-173.	4.3	16
1251	Nuevos modelos transgÃ©nicos para el estudio de la enfermedad de Parkinson basados en sistemas de ediciÃ³n con nucleasas. <i>NeurologÃa</i> , 2020, 35, 486-499.	0.3	2
1252	Application of CRISPR/Cas9 gene editing technique in the study of cancer treatment. <i>Clinical Genetics</i> , 2020, 97, 73-88.	1.0	37
1253	Doxycycline-Dependent Self-Inactivation of CRISPR-Cas9 to Temporally Regulate On- and Off-Target Editing. <i>Molecular Therapy</i> , 2020, 28, 29-41.	3.7	21
1254	Applications of genome editing in farm animals. , 2020, , 131-149.		5
1255	Concepts and potential applications of gene editing in aquaculture. , 2020, , 249-270.		0
1256	New transgenic models of Parkinson's disease using genome editing technology. <i>NeurologÃa (English)</i> Tj ETQq0 0 0 rgBT /Overlock 10 T	0.2	1
1257	Ascorbic Acid 2-Glucoside Stably Promotes the Primitiveness of Embryonic and Mesenchymal Stem Cells Through TenEleven Translocation- and cAMP-Responsive Element-Binding Protein-1-Dependent Mechanisms. <i>Antioxidants and Redox Signaling</i> , 2020, 32, 35-59.	2.5	14
1258	CRISPR: A Screener's Guide. <i>SLAS Discovery</i> , 2020, 25, 233-240.	1.4	11
1259	The Impact of CRISPR-Cas9 on Age-related Disorders: From Pathology to Therapy. , 2020, 11, 895.		8
1260	A glance at genome editing with CRISPR-Cas9 technology. <i>Current Genetics</i> , 2020, 66, 447-462.	0.8	57
1261	Advances in hereditary leiomyomatosis and renal cell carcinoma (HLRCC) research. <i>Seminars in Cancer Biology</i> , 2020, 61, 158-166.	4.3	44
1262	Modelling the Cancer Phenotype in the Era of CRISPR-Cas9 Gene Editing. <i>Clinical Oncology</i> , 2020, 32, 69-74.	0.6	2
1263	Synthetic lethality as an engine for cancer drug target discovery. <i>Nature Reviews Drug Discovery</i> , 2020, 19, 23-38.	21.5	295

#	ARTICLE	IF	CITATIONS
1264	Of Molecules and Mechanisms. Journal of Neuroscience, 2020, 40, 81-88.	1.7	1
1265	Advances in high-throughput methods for the identification of virus receptors. Medical Microbiology and Immunology, 2020, 209, 309-323.	2.6	14
1266	Programmable adenine deamination in bacteria using a Cas9-adenine-deaminase fusion. Chemical Science, 2020, 11, 1657-1664.	3.7	21
1267	Towards a novel therapy against AIDS. Medical Hypotheses, 2020, 137, 109569.	0.8	4
1268	A Functional Assay to Assess Toxicity During Murine B Cell Development In Vitro. Current Protocols in Toxicology / Editorial Board, Mahin D Maines (editor-in-chief) [et Al], 2020, 83, e91.	1.1	0
1269	Construction of an Inducible CRISPR/Cas9 System for CXCR4 Gene and Demonstration of its Effects on MKN-45 Cells. Cell Biochemistry and Biophysics, 2020, 78, 23-30.	0.9	4
1270	Computational approaches for effective CRISPR guide RNA design and evaluation. Computational and Structural Biotechnology Journal, 2020, 18, 35-44.	1.9	119
1271	Cas9 Protein Triggers Differential Expression of Inherent Genes Especially NGFR Expression in 293T Cells. Cellular and Molecular Bioengineering, 2020, 13, 61-72.	1.0	3
1272	Genome-wide synthetic lethal CRISPR screen identifies FIS1 as a genetic interactor of ALS-linked C9ORF72. Brain Research, 2020, 1728, 146601.	1.1	16
1273	An alternative description of power law correlations in DNA sequences. Physica A: Statistical Mechanics and Its Applications, 2020, 545, 123735.	1.2	13
1274	A Novel Hybrid CNN-SVR for CRISPR/Cas9 Guide RNA Activity Prediction. Frontiers in Genetics, 2019, 10, 1303.	1.1	20
1275	Prostate cancer research: The next generation; report from the 2019 Coffey-Holden Prostate Cancer Academy Meeting. Prostate, 2020, 80, 113-132.	1.2	25
1276	GFP tagging based method to analyze the genome editing efficiency of CRISPR/Cas9-gRNAs through transient expression in N. benthamiana. Journal of Plant Biochemistry and Biotechnology, 2020, 29, 183-192.	0.9	2
1277	Cell Reprogramming for Immunotherapy. Methods in Molecular Biology, 2020, , .	0.4	2
1278	GPR108 Is a Highly Conserved AAV Entry Factor. Molecular Therapy, 2020, 28, 367-381.	3.7	77
1279	Experimental Approaches to Identify Host Factors Important for Influenza Virus. Cold Spring Harbor Perspectives in Medicine, 2020, 10, a038521.	2.9	9
1280	The Endoplasmic Reticulum Cargo Receptor SURF4 Facilitates Efficient Erythropoietin Secretion. Molecular and Cellular Biology, 2020, 40, .	1.1	23
1281	Applications of Genome-Wide Screening and Systems Biology Approaches in Drug Repositioning. Cancers, 2020, 12, 2694.	1.7	14

#	ARTICLE	IF	CITATIONS
1282	Illuminating Host-Mycobacterial Interactions with Genome-wide CRISPR Knockout and CRISPRi Screens. <i>Cell Systems</i> , 2020, 11, 239-251.e7.	2.9	23
1283	CRISPR/Cas: From Tumor Gene Editing to T Cell-Based Immunotherapy of Cancer. <i>Frontiers in Immunology</i> , 2020, 11, 2062.	2.2	45
1284	Functional genomics, genetic risk profiling and cell phenotypes in neurodegenerative disease. <i>Neurobiology of Disease</i> , 2020, 146, 105088.	2.1	3
1285	High throughput single-cell detection of multiplex CRISPR-edited gene modifications. <i>Genome Biology</i> , 2020, 21, 266.	3.8	23
1286	An improved shotgun antisense method for mutagenesis and gene identification. <i>BioTechniques</i> , 2020, 68, 163-165.	0.8	2
1287	Targeted CRISPR screening identifies PRMT5 as synthetic lethality combinatorial target with gemcitabine in pancreatic cancer cells. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2020, 117, 28068-28079.	3.3	48
1288	CRISPR/Cas9 genome-wide loss-of-function screening identifies druggable cellular factors involved in sunitinib resistance in renal cell carcinoma. <i>British Journal of Cancer</i> , 2020, 123, 1749-1756.	2.9	13
1289	Computational Methods for Analysis of Large-Scale CRISPR Screens. <i>Annual Review of Biomedical Data Science</i> , 2020, 3, 137-162.	2.8	4
1290	SOX9 Is Essential for Triple-Negative Breast Cancer Cell Survival and Metastasis. <i>Molecular Cancer Research</i> , 2020, 18, 1825-1838.	1.5	38
1291	CRISPR-sub: Analysis of DNA substitution mutations caused by CRISPR-Cas9 in human cells. <i>Computational and Structural Biotechnology Journal</i> , 2020, 18, 1686-1694.	1.9	17
1292	CRISPR/Cas9 technologies in epigenetics research. , 2020, , 537-567.		1
1293	Genome-scale CRISPR screening at high sensitivity with an empirically designed sgRNA library. <i>BMC Biology</i> , 2020, 18, 174.	1.7	24
1294	Unique Immune Cell Coactivators Specify Locus Control Region Function and Cell Stage. <i>Molecular Cell</i> , 2020, 80, 845-861.e10.	4.5	21
1295	SeqCor: correct the effect of guide RNA sequences in clustered regularly interspaced short palindromic repeats/Cas9 screening by machine learning algorithm. <i>Journal of Genetics and Genomics</i> , 2020, 47, 672-680.	1.7	6
1296	ASH2L drives proliferation and sensitivity to bleomycin and other genotoxins in Hodgkin's lymphoma and testicular cancer cells. <i>Cell Death and Disease</i> , 2020, 11, 1019.	2.7	10
1297	An inducible CRISPR interference library for genetic interrogation of <i>Saccharomyces cerevisiae</i> biology. <i>Communications Biology</i> , 2020, 3, 723.	2.0	24
1298	CRISPR-Cas deployment in non-small cell lung cancer for target screening, validations, and discoveries. <i>Cancer Gene Therapy</i> , 2021, 28, 566-580.	2.2	4
1299	Quantitative and multiplexed chemical-genetic phenotyping in mammalian cells with QMAP-Seq. <i>Nature Communications</i> , 2020, 11, 5722.	5.8	1

#	ARTICLE	IF	CITATIONS
1300	Programmable Live-Cell CRISPR Imaging with Toehold-Switch-Mediated Strand Displacement. <i>Angewandte Chemie</i> , 2020, 132, 20793-20799.	1.6	9
1301	A simple and highly efficient method for multi-allelic CRISPR-Cas9 editing in primary cell cultures. <i>Cancer Reports</i> , 2020, 3, e1269.	0.6	12
1302	CRISPR-Cas9 System for Plant Genome Editing: Current Approaches and Emerging Developments. <i>Agronomy</i> , 2020, 10, 1033.	1.3	47
1303	Low-Dose Vertical Inhibition of the RAF-MEK-ERK Cascade Causes Apoptotic Death of KRAS Mutant Cancers. <i>Cell Reports</i> , 2020, 31, 107764.	2.9	69
1304	Aspects of Gene Therapy Products Using Current Genome-Editing Technology in Japan. <i>Human Gene Therapy</i> , 2020, 31, 1043-1053.	1.4	8
1305	autoBioSeqpy: A Deep Learning Tool for the Classification of Biological Sequences. <i>Journal of Chemical Information and Modeling</i> , 2020, 60, 3755-3764.	2.5	17
1306	Programmable Live-Cell CRISPR Imaging with Toehold-Switch-Mediated Strand Displacement. <i>Angewandte Chemie - International Edition</i> , 2020, 59, 20612-20618.	7.2	48
1307	CRISPR/Cas9-related technologies in liver diseases: from feasibility to future diversity. <i>International Journal of Biological Sciences</i> , 2020, 16, 2283-2295.	2.6	11
1308	High-Throughput Screening: today's biochemical and cell-based approaches. <i>Drug Discovery Today</i> , 2020, 25, 1807-1821.	3.2	119
1309	CRISPR/Cas9 in Male Factor Infertility. <i>Current Tissue Microenvironment Reports</i> , 2020, 1, 89-97.	1.3	3
1310	CRISPR: a journey of gene-editing based medicine. <i>Genes and Genomics</i> , 2020, 42, 1369-1380.	0.5	4
1311	A CRISPR-Cas9 screen identifies mitochondrial translation as an essential process in latent KSHV infection of human endothelial cells. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2020, 117, 28384-28392.	3.3	13
1312	A human tissue screen identifies a regulator of ER secretion as a brain-size determinant. <i>Science</i> , 2020, 370, 935-941.	6.0	101
1313	In silico Method in CRISPR/Cas System: An Expedite and Powerful Booster. <i>Frontiers in Oncology</i> , 2020, 10, 584404.	1.3	7
1314	Background-suppressed live visualization of genomic loci with an improved CRISPR system based on a split fluorophore. <i>Genome Research</i> , 2020, 30, 1306-1316.	2.4	12
1315	Loss of the Nuclear Protein RTF2 Enhances Influenza Virus Replication. <i>Journal of Virology</i> , 2020, 94, .	1.5	5
1316	High-throughput single-cell functional elucidation of neurodevelopmental disease-associated genes reveals convergent mechanisms altering neuronal differentiation. <i>Genome Research</i> , 2020, 30, 1317-1331.	2.4	50
1317	Designing custom CRISPR libraries for hypothesis-driven drug target discovery. <i>Computational and Structural Biotechnology Journal</i> , 2020, 18, 2237-2246.	1.9	10

#	ARTICLE	IF	CITATIONS
1318	Interrogating genome function using CRISPR tools: a narrative review. <i>Journal of Bio-X Research</i> , 2020, 3, 83-91.	0.3	0
1319	Advances in Genomics for Drug Development. <i>Genes</i> , 2020, 11, 942.	1.0	22
1320	Efficient Multi-Allelic Genome Editing of Primary Cell Cultures via CRISPR-Cas9 Ribonucleoprotein Nucleofection. <i>Current Protocols in Stem Cell Biology</i> , 2020, 54, e126.	3.0	9
1321	Use of Customizable Nucleases for Gene Editing and Other Novel Applications. <i>Genes</i> , 2020, 11, 976.	1.0	9
1322	Identification of CYP46A1 as a new regulator of lipid metabolism through CRISPR-based whole-genome screening. <i>FASEB Journal</i> , 2020, 34, 13776-13791.	0.2	8
1323	Suppression of non-homologous end joining does not rescue DNA repair defects in Fanconi anemia patient cells. <i>Cell Cycle</i> , 2020, 19, 2553-2561.	1.3	6
1324	MasterPATH: network analysis of functional genomics screening data. <i>BMC Genomics</i> , 2020, 21, 632.	1.2	3
1325	Discovering functional sequences with RELICS, an analysis method for CRISPR screens. <i>PLoS Computational Biology</i> , 2020, 16, e1008194.	1.5	7
1326	A polyclonal allelic expression assay for detecting regulatory effects of transcript variants. <i>Genome Medicine</i> , 2020, 12, 79.	3.6	5
1327	CRISPR/Cas9 high-throughput screening in cancer research. <i>E3S Web of Conferences</i> , 2020, 185, 03032.	0.2	0
1328	Systematic screening for potential therapeutic targets in osteosarcoma through a kinome-wide CRISPR-Cas9 library. <i>Cancer Biology and Medicine</i> , 2020, 17, 782-794.	1.4	8
1329	A genome-scale CRISPR knock-out screen in chronic myeloid leukemia identifies novel drug resistance mechanisms along with intrinsic apoptosis and MAPK signaling. <i>Cancer Medicine</i> , 2020, 9, 6739-6751.	1.3	6
1330	CRISPR and transposon in vivo screens for cancer drivers and therapeutic targets. <i>Genome Biology</i> , 2020, 21, 204.	3.8	14
1331	PINCER: improved CRISPR/Cas9 screening by efficient cleavage at conserved residues. <i>Nucleic Acids Research</i> , 2020, 48, 9462-9477.	6.5	6
1332	In vivo CRISPR screening for phenotypic targets of the mir-35-42 family in <i>C. elegans</i> . <i>Genes and Development</i> , 2020, 34, 1227-1238.	2.7	20
1333	Knockout of the Transducin-Like Enhancer of Split 6 Gene Affects the Proliferation and Cell Cycle Process of Mouse Spermatogonia. <i>International Journal of Molecular Sciences</i> , 2020, 21, 5827.	1.8	8
1334	Efficiency of Recombinant CRISPR/rCas9-Mediated miRNA Gene Editing in Rice. <i>International Journal of Molecular Sciences</i> , 2020, 21, 9606.	1.8	26
1335	From Phenotypic Hit to Chemical Probe: Chemical Biology Approaches to Elucidate Small Molecule Action in Complex Biological Systems. <i>Molecules</i> , 2020, 25, 5702.	1.7	14

#	ARTICLE	IF	CITATIONS
1336	Functional Screening Techniques to Identify Long Non-Coding RNAs as Therapeutic Targets in Cancer. <i>Cancers</i> , 2020, 12, 3695.	1.7	11
1337	CiBER-seq dissects genetic networks by quantitative CRISPRi profiling of expression phenotypes. <i>Science</i> , 2020, 370, .	6.0	19
1338	Long Noncoding RNA SOX2-OT: Regulations, Functions, and Roles on Mental Illnesses, Cancers, and Diabetic Complications. <i>BioMed Research International</i> , 2020, 2020, 1-12.	0.9	12
1339	Multiplex CRISPR/Cas screen in regenerating haploid limbs of chimeric Axolotls. <i>ELife</i> , 2020, 9, .	2.8	13
1340	Disease modeling and stem cell immunoengineering in regenerative medicine using CRISPR/Cas9 systems. <i>Computational and Structural Biotechnology Journal</i> , 2020, 18, 3649-3665.	1.9	7
1341	A Gene Expression High-Throughput Screen (GE-HTS) for Coordinated Detection of Functionally Similar Effectors in Cancer. <i>Cancers</i> , 2020, 12, 3143.	1.7	6
1342	An in vivo genome-wide CRISPR screen identifies the RNA-binding protein Stauf2 as a key regulator of myeloid leukemia. <i>Nature Cancer</i> , 2020, 1, 410-422.	5.7	37
1343	Therapeutic applications of PARP inhibitors in ovarian cancer. <i>Biomedicine and Pharmacotherapy</i> , 2020, 127, 110204.	2.5	29
1344	Genome-wide CRISPR screening reveals genes essential for cell viability and resistance to abiotic and biotic stresses in <i>Bombyx mori</i> . <i>Genome Research</i> , 2020, 30, 757-767.	2.4	29
1345	A Whole Genome-Wide Arrayed CRISPR Screen in Primary Organ Fibroblasts to Identify Regulators of Kidney Fibrosis. <i>SLAS Discovery</i> , 2020, 25, 591-604.	1.4	6
1346	A Novel Screening Approach for the Dissection of Cellular Regulatory Networks of NF- κ B Using Arrayed CRISPR gRNA Libraries. <i>SLAS Discovery</i> , 2020, 25, 618-633.	1.4	4
1347	CLUE: a bioinformatic and wet-lab pipeline for multiplexed cloning of custom sgRNA libraries. <i>Nucleic Acids Research</i> , 2020, 48, e78.	6.5	2
1348	Endogenous CRISPR/Cas9 arrays for scalable whole-organism lineage tracing. <i>Development (Cambridge)</i> , 2020, 147, .	1.2	12
1349	CRISPR screen in mechanism and target discovery for cancer immunotherapy. <i>Biochimica Et Biophysica Acta: Reviews on Cancer</i> , 2020, 1874, 188378.	3.3	25
1350	Genomics-guided pre-clinical development of cancer therapies. <i>Nature Cancer</i> , 2020, 1, 482-492.	5.7	23
1351	The Network of Angiotensin Receptors in Breast Cancer. <i>Cells</i> , 2020, 9, 1336.	1.8	17
1352	NF45 and NF90 Regulate Mitotic Gene Expression by Competing with Staufin-Mediated mRNA Decay. <i>Cell Reports</i> , 2020, 31, 107660.	2.9	19
1353	Ribosomal protein S11 influences glioma response to TOP2 poisons. <i>Oncogene</i> , 2020, 39, 5068-5081.	2.6	21

#	ARTICLE	IF	CITATIONS
1354	CRISPRpred(SEQ): a sequence-based method for sgRNA on target activity prediction using traditional machine learning. BMC Bioinformatics, 2020, 21, 223.	1.2	22
1355	Dysfunctional telomeres trigger cellular senescence mediated by cyclic GMP-AMP synthase. Journal of Biological Chemistry, 2020, 295, 11144-11160.	1.6	32
1356	Genome editing with CRISPR-Cas nucleases, base editors, transposases and prime editors. Nature Biotechnology, 2020, 38, 824-844.	9.4	1,277
1357	Applications of Nanomaterials in Human Health. , 2020, , .		21
1358	Synthetic Genomes. Annual Review of Biochemistry, 2020, 89, 77-101.	5.0	48
1359	Filoviruses Use the HOPS Complex and UVRAG To Traffic to Niemann-Pick C1 Compartments during Viral Entry. Journal of Virology, 2020, 94, .	1.5	5
1360	Prediction of the sequence-specific cleavage activity of Cas9 variants. Nature Biotechnology, 2020, 38, 1328-1336.	9.4	133
1361	Multilayered VBC score predicts sgRNAs that efficiently generate loss-of-function alleles. Nature Methods, 2020, 17, 708-716.	9.0	77
1362	Keap1 mutation renders lung adenocarcinomas dependent on Slc33a1. Nature Cancer, 2020, 1, 589-602.	5.7	44
1363	CRISPR/Cas system of prokaryotic extremophiles and its applications. , 2020, , 155-168.		1
1364	Determinants of Base Editing Outcomes from Target Library Analysis and Machine Learning. Cell, 2020, 182, 463-480.e30.	13.5	166
1365	Synthetic Biology Speeds Up Drug Target Discovery. Frontiers in Pharmacology, 2020, 11, 119.	1.6	13
1366	Nucleic Acid Immunotherapeutics for Cancer. ACS Applied Bio Materials, 2020, 3, 2838-2849.	2.3	18
1367	Genetic interaction mapping and exon-resolution functional genomics with a hybrid Cas9-Cas12a platform. Nature Biotechnology, 2020, 38, 638-648.	9.4	85
1368	Using antagonistic pleiotropy to design a chemotherapy-induced evolutionary trap to target drug resistance in cancer. Nature Genetics, 2020, 52, 408-417.	9.4	47
1369	A benchmark of algorithms for the analysis of pooled CRISPR screens. Genome Biology, 2020, 21, 62.	3.8	45
1370	Construction of a CRISPR-based paired sgRNA library for chromosomal deletion of long non-coding RNAs. Quantitative Biology, 2020, 8, 31-42.	0.3	3
1371	Epigenetic regulation of kidney progenitor cells. Stem Cells Translational Medicine, 2020, 9, 655-660.	1.6	10

#	ARTICLE	IF	CITATIONS
1372	CRISPR screens in cancer spheroids identify 3D growth-specific vulnerabilities. <i>Nature</i> , 2020, 580, 136-141.	13.7	203
1373	Genetic modification of the protozoan <i>Eimeria tenella</i> using the CRISPR/Cas9 system. <i>Veterinary Research</i> , 2020, 51, 41.	1.1	13
1374	Pervasive functional translation of noncanonical human open reading frames. <i>Science</i> , 2020, 367, 1140-1146.	6.0	400
1375	gscreeend: modelling asymmetric count ratios in CRISPR screens to decrease experiment size and improve phenotype detection. <i>Genome Biology</i> , 2020, 21, 53.	3.8	34
1376	Cryptochromes modulate E2F family transcription factors. <i>Scientific Reports</i> , 2020, 10, 4077.	1.6	17
1377	Rapid construction of a whole-genome mutant library by combining haploid stem cells and inducible self-inactivating PiggyBac transposon. <i>Protein and Cell</i> , 2020, 11, 452-457.	4.8	3
1378	CRISPR-based technology to silence the expression of lncRNAs. <i>Proceedings of the National Academy of Sciences of the United States of America</i> , 2020, 117, 8225-8227.	3.3	9
1379	Genome-wide CRISPR screen identifies ZIC2 as an essential gene that controls the cell fate of early mesodermal precursors to human heart progenitors. <i>Stem Cells</i> , 2020, 38, 741-755.	1.4	15
1380	C-RNNCrispr: Prediction of CRISPR/Cas9 sgRNA activity using convolutional and recurrent neural networks. <i>Computational and Structural Biotechnology Journal</i> , 2020, 18, 344-354.	1.9	37
1381	Clonal tracking using embedded viral barcoding and high-throughput sequencing. <i>Nature Protocols</i> , 2020, 15, 1436-1458.	5.5	20
1382	Genome-Scale CRISPR Screening in Human Intestinal Organoids Identifies Drivers of TGF- β Resistance. <i>Cell Stem Cell</i> , 2020, 26, 431-440.e8.	5.2	103
1383	Targeted genome editing using CRISPR/Cas9 system in fungi. , 2020, , 45-67.		0
1384	Technologies and Computational Analysis Strategies for CRISPR Applications. <i>Molecular Cell</i> , 2020, 79, 11-29.	4.5	28
1385	CRISPR-based functional genomics for neurological disease. <i>Nature Reviews Neurology</i> , 2020, 16, 465-480.	4.9	89
1386	Selenium detoxification is required for cancer-cell survival. <i>Nature Metabolism</i> , 2020, 2, 603-611.	5.1	97
1387	Knockout of Pi21 by CRISPR/Cas9 and iTRAQ-Based Proteomic Analysis of Mutants Revealed New Insights into <i>M. oryzae</i> Resistance in Elite Rice Line. <i>Genes</i> , 2020, 11, 735.	1.0	36
1388	Genetic Screening for Novel Regulators of Immune Checkpoint Molecules. <i>Trends in Immunology</i> , 2020, 41, 692-705.	2.9	2
1389	The novel insight into the outcomes of CRISPR/Cas9 editing intra- and inter-species. <i>International Journal of Biological Macromolecules</i> , 2020, 163, 711-717.	3.6	7

#	ARTICLE	IF	CITATIONS
1390	An <i>in vitro</i> site-specific cleavage assay of CRISPR-Cas9 using a personal glucose meter. <i>Chemical Communications</i> , 2020, 56, 8850-8853.	2.2	8
1391	CRISPR/Cas9-mediated whole genomic wide knockout screening identifies mitochondrial ribosomal proteins involving in oxygen-glucose deprivation/reperfusion resistance. <i>Journal of Cellular and Molecular Medicine</i> , 2020, 24, 9313-9322.	1.6	7
1392	Systematic functional identification of cancer multi-drug resistance genes. <i>Genome Biology</i> , 2020, 21, 27.	3.8	26
1393	Applications of Functional Genomics for Drug Discovery. <i>SLAS Discovery</i> , 2020, 25, 823-842.	1.4	6
1394	Genetic screens in isogenic mammalian cell lines without single cell cloning. <i>Nature Communications</i> , 2020, 11, 752.	5.8	83
1395	A cornucopia of mutants for understanding plant embryo development. <i>New Phytologist</i> , 2020, 226, 289-291.	3.5	1
1396	Integration, abundance, and transmission of mutations and transgenes in a series of CRISPR/Cas9 soybean lines. <i>BMC Biotechnology</i> , 2020, 20, 10.	1.7	21
1397	Comprehensive Genome-wide Perturbations via CRISPR Adaptation Reveal Complex Genetics of Antibiotic Sensitivity. <i>Cell</i> , 2020, 180, 1002-1017.e31.	13.5	36
1398	Applications and advances of CRISPR/Cas9 in animal cancer model. <i>Briefings in Functional Genomics</i> , 2020, 19, 235-241.	1.3	6
1399	Determining the Biological Mechanisms of Action for Environmental Exposures: Applying CRISPR/Cas9 to Toxicological Assessments. <i>Toxicological Sciences</i> , 2020, 175, 5-18.	1.4	11
1400	Utilizing CRISPR/Cas9 technology to prepare lymphoblastoid cell lines harboring genetic mutations for generating quality control materials in genetic testing. <i>Journal of Clinical Laboratory Analysis</i> , 2020, 34, e23256.	0.9	3
1401	The rapidly advancing Class 2 CRISPR-Cas technologies: A customizable toolbox for molecular manipulations. <i>Journal of Cellular and Molecular Medicine</i> , 2020, 24, 3256-3270.	1.6	39
1402	Deep learning improves the ability of sgRNA off-target propensity prediction. <i>BMC Bioinformatics</i> , 2020, 21, 51.	1.2	41
1403	Comparison of CRISPR and Marker-Based Methods for the Engineering of Phage T7. <i>Viruses</i> , 2020, 12, 193.	1.5	23
1404	A systems approach to infectious disease. <i>Nature Reviews Genetics</i> , 2020, 21, 339-354.	7.7	72
1405	Maintaining Iron Homeostasis Is the Key Role of Lysosomal Acidity for Cell Proliferation. <i>Molecular Cell</i> , 2020, 77, 645-655.e7.	4.5	144
1406	Generalizable sgRNA design for improved CRISPR/Cas9 editing efficiency. <i>Bioinformatics</i> , 2020, 36, 2684-2689.	1.8	41
1407	West Nile virus capsid protein inhibits autophagy by AMP-activated protein kinase degradation in neurological disease development. <i>PLoS Pathogens</i> , 2020, 16, e1008238.	2.1	28

#	ARTICLE	IF	CITATIONS
1408	Towards a comprehensive catalogue of validated and target-linked human enhancers. <i>Nature Reviews Genetics</i> , 2020, 21, 292-310.	7.7	229
1409	scMAGeCK links genotypes with multiple phenotypes in single-cell CRISPR screens. <i>Genome Biology</i> , 2020, 21, 19.	3.8	46
1410	Are the current gRNA ranking prediction algorithms useful for genome editing in plants?. <i>PLoS ONE</i> , 2020, 15, e0227994.	1.1	52
1411	Good guide, bad guide: spacer sequence-dependent cleavage efficiency of Cas12a. <i>Nucleic Acids Research</i> , 2020, 48, 3228-3243.	6.5	62
1412	CRISPR/Cas9 gene editing in a chicken model: current approaches and applications. <i>Journal of Applied Genetics</i> , 2020, 61, 221-229.	1.0	23
1413	Identification of functional regulatory elements in the human genome using pooled CRISPR screens. <i>BMC Genomics</i> , 2020, 21, 107.	1.2	12
1414	sgRNA-PSM: Predict sgRNAs On-Target Activity Based on Position-Specific Mismatch. <i>Molecular Therapy - Nucleic Acids</i> , 2020, 20, 323-330.	2.3	13
1415	Pooled In Vitro and In Vivo CRISPR-Cas9 Screening Identifies Tumor Suppressors in Human Colon Organoids. <i>Cell Stem Cell</i> , 2020, 26, 782-792.e7.	5.2	131
1416	TIE2 Induces Breast Cancer Cell Dormancy and Inhibits the Development of Osteolytic Bone Metastases. <i>Cancers</i> , 2020, 12, 868.	1.7	9
1417	ZBTB1 Regulates Asparagine Synthesis and Leukemia Cell Response to L-Asparaginase. <i>Cell Metabolism</i> , 2020, 31, 852-861.e6.	7.2	40
1418	Interleukin-10 contributes to PGE2 signalling through upregulation of EP4 via SHIP1 and STAT3. <i>PLoS ONE</i> , 2020, 15, e0230427.	1.1	13
1420	Gene delivery into cells and tissues. , 2020, , 519-554.		3
1421	A Live-Cell Screen for Altered Erk Dynamics Reveals Principles of Proliferative Control. <i>Cell Systems</i> , 2020, 10, 240-253.e6.	2.9	58
1422	Genome-Wide CRISPRi-Based Identification of Targets for Decoupling Growth from Production. <i>ACS Synthetic Biology</i> , 2020, 9, 1030-1040.	1.9	29
1423	Interleukin-10 control of pre-miR155 maturation involves CELF2. <i>PLoS ONE</i> , 2020, 15, e0231639.	1.1	5
1424	Characterization of the interactions between Codanin-1 and C15Orf41, two proteins implicated in congenital dyserythropoietic anemia type I disease. <i>BMC Molecular and Cell Biology</i> , 2020, 21, 18.	1.0	9
1425	Quantitative analysis of interactive behavior of mitochondria and lysosomes using structured illumination microscopy. <i>Biomaterials</i> , 2020, 250, 120059.	5.7	77
1426	Pooled Knockin Targeting for Genome Engineering of Cellular Immunotherapies. <i>Cell</i> , 2020, 181, 728-744.e21.	13.5	131

#	ARTICLE	IF	CITATIONS
1427	CGD: Comprehensive guide designer for CRISPR-Cas systems. Computational and Structural Biotechnology Journal, 2020, 18, 814-820.	1.9	6
1428	A20 and RBX1 Regulate Brentuximab Vedotin Sensitivity in Hodgkin Lymphoma Models. Clinical Cancer Research, 2020, 26, 4093-4106.	3.2	19
1429	CRISPRi-based radiation modifier screen identifies long non-coding RNA therapeutic targets in glioma. Genome Biology, 2020, 21, 83.	3.8	76
1430	Mouse Models of Myeloid Malignancies. Cold Spring Harbor Perspectives in Medicine, 2021, 11, a035535.	2.9	3
1431	CRISPR Tools for Physiology and Cell State Changes: Potential of Transcriptional Engineering and Epigenome Editing. Physiological Reviews, 2021, 101, 177-211.	13.1	13
1432	Genome editing: applications for medicinal and aromatic plants. , 2021, , 119-144.		8
1433	CRISP-view: a database of functional genetic screens spanning multiple phenotypes. Nucleic Acids Research, 2021, 49, D848-D854.	6.5	15
1434	CRISPR/Cas: A powerful tool for gene function study and crop improvement. Journal of Advanced Research, 2021, 29, 207-221.	4.4	136
1435	Illuminating single genomic loci in live cells by reducing nuclear background fluorescence. Science China Life Sciences, 2021, 64, 667-677.	2.3	4
1436	CRISPR technology: The engine that drives cancer therapy. Biomedicine and Pharmacotherapy, 2021, 133, 111007.	2.5	30
1437	CRISPRing future medicines. Expert Opinion on Drug Discovery, 2021, 16, 463-473.	2.5	2
1438	A comprehensive review on sonocatalytic, photocatalytic, and sonophotocatalytic processes for the degradation of antibiotics in water: Synergistic mechanism and degradation pathway. Chemical Engineering Journal, 2021, 413, 127412.	6.6	173
1439	Transcriptional enhancers: from prediction to functional assessment on a genome-wide scale. Genome, 2021, 64, 426-448.	0.9	12
1440	Massively parallel kinetic profiling of natural and engineered CRISPR nucleases. Nature Biotechnology, 2021, 39, 84-93.	9.4	80
1441	Generation of <i>CD163</i> -edited pig via electroporation of the CRISPR/Cas9 system into porcine <i>in vitro</i> -fertilized zygotes. Animal Biotechnology, 2021, 32, 147-154.	0.7	29
1443	Trends in CRISPR-Cas9 technology application in cancer. Progress in Molecular Biology and Translational Science, 2021, 178, 175-192.	0.9	0
1445	Spezielle zellbiologische Methoden in der Zellkultur. , 2021, , 251-302.		0
1446	Spliceosome-targeted therapies trigger an antiviral immune response in triple-negative breast cancer. Cell, 2021, 184, 384-403.e21.	13.5	94

#	ARTICLE	IF	CITATIONS
1447	CRISPR/Cas9 screening identifies a kinetochore-microtubule dependent mechanism for AuroraA inhibitor resistance in breast cancer. <i>Cancer Communications</i> , 2021, 41, 121-139.	3.7	25
1448	Functional Genomics Approaches to Elucidate Vulnerabilities of Intrinsic and Acquired Chemotherapy Resistance. <i>Cells</i> , 2021, 10, 260.	1.8	4
1449	Harnessing CRISPR-Cas system diversity for gene editing technologies. <i>Journal of Biomedical Research</i> , 2021, 35, 91.	0.7	1
1450	Sequential Activation of Guide RNAs to Enable Successive CRISPR-Cas9 Activities. <i>Molecular Cell</i> , 2021, 81, 226-238.e5.	4.5	7
1451	Targeted plant improvement through genome editing: from laboratory to field. <i>Plant Cell Reports</i> , 2021, 40, 935-951.	2.8	47
1452	SgRNA-RF: Identification of SgRNA On-Target Activity With Imbalanced Datasets. <i>IEEE/ACM Transactions on Computational Biology and Bioinformatics</i> , 2022, 19, 2442-2453.	1.9	5
1453	RNAi for livestock improvement. , 2021, , 91-107.		1
1454	Alternative types of editing. , 2021, , 123-143.		1
1455	Delivery Methods, Resources and Design Tools in CRISPR/Cas. , 2021, , 63-116.		5
1456	Genome editing of immune cells using CRISPR/Cas9. <i>BMB Reports</i> , 2021, 54, 59-69.	1.1	8
1457	Functional Comparison between VP64-dCas9-VP64 and dCas9-VP192 CRISPR Activators in Human Embryonic Kidney Cells. <i>International Journal of Molecular Sciences</i> , 2021, 22, 397.	1.8	5
1458	CRISPR-Cas9 in cancer therapeutics. <i>Progress in Molecular Biology and Translational Science</i> , 2021, 181, 129-163.	0.9	2
1459	Recent advances in stem cells and gene editing: Drug discovery and therapeutics. <i>Progress in Molecular Biology and Translational Science</i> , 2021, 181, 231-269.	0.9	6
1460	Targeted genome editing. , 2021, , 75-89.		7
1461	Engineering wheat for gluten safe. , 2021, , 177-197.		0
1462	Targeted Genetic Changes in <i>Candida albicans</i> Using Transient CRISPR-Cas9 Expression. <i>Current Protocols</i> , 2021, 1, e19.	1.3	4
1463	Guide-target mismatch effects on dCas9-sgRNA binding activity in living bacterial cells. <i>Nucleic Acids Research</i> , 2021, 49, 1263-1277.	6.5	16
1464	CRISPR/Cas mediated epigenome editing for cancer therapy. <i>Seminars in Cancer Biology</i> , 2022, 83, 570-583.	4.3	20

#	ARTICLE	IF	CITATIONS
1465	Efficient Immune Cell Genome Engineering with Enhanced CRISPR Editing Tools. <i>ImmunoHorizons</i> , 2021, 5, 117-132.	0.8	4
1466	CellBox: Interpretable Machine Learning for Perturbation Biology with Application to the Design of Cancer Combination Therapy. <i>Cell Systems</i> , 2021, 12, 128-140.e4.	2.9	67
1467	DAZAP2 acts as specifier of the p53 response to DNA damage. <i>Nucleic Acids Research</i> , 2021, 49, 2759-2776.	6.5	6
1468	Single-cell RNA sequencing of developing maize ears facilitates functional analysis and trait candidate gene discovery. <i>Developmental Cell</i> , 2021, 56, 557-568.e6.	3.1	129
1469	CRISPR Takes the Front Seat in CART-Cell Development. <i>BioDrugs</i> , 2021, 35, 113-124.	2.2	10
1470	Imaging-based screens of pool-synthesized cell libraries. <i>Nature Methods</i> , 2021, 18, 358-365.	9.0	15
1471	Drug Combination in Cancer Treatment—From Cocktails to Conjugated Combinations. <i>Cancers</i> , 2021, 13, 669.	1.7	57
1472	Bioinformatics and Functional Analyses Implicate Potential Roles for EOGT and L-fringe in Pancreatic Cancers. <i>Molecules</i> , 2021, 26, 882.	1.7	14
1473	Considering the potential for gene-based therapy in prostate cancer. <i>Nature Reviews Urology</i> , 2021, 18, 170-184.	1.9	13
1475	Fluctuation induced conductivity and pseudogap state studies of Bi _{1.6} Pb _{0.4} Sr ₂ Ca ₂ Cu ₃ O ₁₀ + δ superconductor added with ZnO nanoparticles. <i>Scientific Reports</i> , 2021, 11, 4341.	1.6	17
1476	Shiga Toxins: An Update on Host Factors and Biomedical Applications. <i>Toxins</i> , 2021, 13, 222.	1.5	19
1477	Detection of gene cis-regulatory element perturbations in single-cell transcriptomes. <i>PLoS Computational Biology</i> , 2021, 17, e1008789.	1.5	0
1478	Targeting “undruggable” c-Myc protein by synthetic lethality. <i>Frontiers of Medicine</i> , 2021, 15, 541-550.	1.5	8
1479	Integrated cross-study datasets of genetic dependencies in cancer. <i>Nature Communications</i> , 2021, 12, 1661.	5.8	135
1480	Lineage tracing and analog recording in mammalian cells by single-site DNA writing. <i>Nature Chemical Biology</i> , 2021, 17, 739-747.	3.9	42
1481	Venetoclax sensitivity in multiple myeloma is associated with B-cell gene expression. <i>Blood</i> , 2021, 137, 3604-3615.	0.6	44
1482	Epigenetic editing: Dissecting chromatin function in context. <i>BioEssays</i> , 2021, 43, e2000316.	1.2	22
1483	A genome-scale CRISPR Cas9 dropout screen identifies synthetically lethal targets in SRC-3 inhibited cancer cells. <i>Communications Biology</i> , 2021, 4, 399.	2.0	8

#	ARTICLE	IF	CITATIONS
1484	Evaluation of CRISPR/Cas9 site-specific function and validation of sgRNA sequence by a Cas9/sgRNA-assisted reverse PCR technique. <i>Analytical and Bioanalytical Chemistry</i> , 2021, 413, 2447-2456.	1.9	4
1486	Epstein-Barr virus nuclear antigen 3C (EBNA3C) interacts with the metabolism sensing C-terminal binding protein (CtBP) repressor to upregulate host genes. <i>PLoS Pathogens</i> , 2021, 17, e1009419.	2.1	8
1488	Anti-EGFR VHH-armed death receptor ligand-engineered allogeneic stem cells have therapeutic efficacy in diverse brain metastatic breast cancers. <i>Science Advances</i> , 2021, 7, .	4.7	10
1489	In vivo screens using a selective CRISPR antigen removal lentiviral vector system reveal immune dependencies in renal cell carcinoma. <i>Immunity</i> , 2021, 54, 571-585.e6.	6.6	50
1490	CRISPR/Cas12a-mediated genome engineering in the photosynthetic bacterium <i>Rhodobacter capsulatus</i> . <i>Microbial Biotechnology</i> , 2021, 14, 2700-2710.	2.0	7
1491	Establishment of CRISPR/Cas9 mediated targeted mutagenesis in hop (<i>Humulus lupulus</i>). <i>Plant Physiology and Biochemistry</i> , 2021, 160, 1-7.	2.8	14
1492	CRISPR/Cas9 Mediated High Efficiency Knockout of Myosin Essential Light Chain Gene in the Pacific Oyster (<i>Crassostrea Gigas</i>). <i>Marine Biotechnology</i> , 2021, 23, 215-224.	1.1	10
1493	Genome Editing in iPSC-Based Neural Systems: From Disease Models to Future Therapeutic Strategies. <i>Frontiers in Genome Editing</i> , 2021, 3, 630600.	2.7	22
1494	CRISPR Screens in Synthetic Lethality and Combinatorial Therapies for Cancer. <i>Cancers</i> , 2021, 13, 1591.	1.7	20
1495	Review, analysis, and optimization of the CRISPR <i>Streptococcus pyogenes</i> Cas9 system. <i>Medicine in Drug Discovery</i> , 2021, 9, 100080.	2.3	8
1496	CRISPRi screens reveal a DNA methylation-mediated 3D genome dependent causal mechanism in prostate cancer. <i>Nature Communications</i> , 2021, 12, 1781.	5.8	32
1498	Highly efficient CRISPR-Cas9-mediated gene knockout in primary human B cells for functional genetic studies of Epstein-Barr virus infection. <i>PLoS Pathogens</i> , 2021, 17, e1009117.	2.1	17
1499	Disruption of the MSL complex inhibits tumour maintenance by exacerbating chromosomal instability. <i>Nature Cell Biology</i> , 2021, 23, 401-412.	4.6	13
1500	Genome oligopaint via local denaturation fluorescence in situ hybridization. <i>Molecular Cell</i> , 2021, 81, 1566-1577.e8.	4.5	19
1501	TMTpro-18plex: The Expanded and Complete Set of TMTpro Reagents for Sample Multiplexing. <i>Journal of Proteome Research</i> , 2021, 20, 2964-2972.	1.8	158
1503	Using CRISPR to understand and manipulate gene regulation. <i>Development (Cambridge)</i> , 2021, 148, .	1.2	9
1504	The Mammalian and Yeast A49 and A34 Heterodimers: Homologous but Not the Same. <i>Genes</i> , 2021, 12, 620.	1.0	4
1505	Regulation of polyubiquitin genes to meet cellular ubiquitin requirement. <i>BMB Reports</i> , 2021, 54, 189-195.	1.1	8

#	ARTICLE	IF	CITATIONS
1507	Mechanisms Contributing to the Dysregulation of miRNA-124 in Pulmonary Hypertension. <i>International Journal of Molecular Sciences</i> , 2021, 22, 3852.	1.8	12
1508	The World of Stable Ribonucleoproteins and Its Mapping With Grad-Seq and Related Approaches. <i>Frontiers in Molecular Biosciences</i> , 2021, 8, 661448.	1.6	18
1509	Two novel mouse models mimicking minor deletions in 22q11.2 deletion syndrome revealed the contribution of each deleted region to psychiatric disorders. <i>Molecular Brain</i> , 2021, 14, 68.	1.3	6
1510	Mutational analyses of novel rat models with targeted modifications in inflammatory bowel disease susceptibility genes. <i>Mammalian Genome</i> , 2021, 32, 173-182.	1.0	2
1511	Efficient generation of homozygous substitutions in rice in one generation utilizing an rABE8e base editor. <i>Journal of Integrative Plant Biology</i> , 2021, 63, 1595-1599.	4.1	30
1513	STING enhances cell death through regulation of reactive oxygen species and DNA damage. <i>Nature Communications</i> , 2021, 12, 2327.	5.8	78
1514	CRISPR Genome Editing Technology and its Application in Genetic Diseases: A Review. <i>Current Pharmaceutical Biotechnology</i> , 2021, 22, 468-479.	0.9	2
1515	Understanding Omics Driven Plant Improvement and de novo Crop Domestication: Some Examples. <i>Frontiers in Genetics</i> , 2021, 12, 637141.	1.1	20
1516	CRISPR screens in plants: approaches, guidelines, and future prospects. <i>Plant Cell</i> , 2021, 33, 794-813.	3.1	54
1517	Soluble adenyl cyclase regulates the cytosolic NADH/NAD ⁺ redox state and the bioenergetic switch between glycolysis and oxidative phosphorylation. <i>Biochimica Et Biophysica Acta - Bioenergetics</i> , 2021, 1862, 148367.	0.5	12
1518	Integrating Biomaterials and Genome Editing Approaches to Advance Biomedical Science. <i>Annual Review of Biomedical Engineering</i> , 2021, 23, 493-516.	5.7	4
1519	Enhancing CRISPR-Cas9 gRNA efficiency prediction by data integration and deep learning. <i>Nature Communications</i> , 2021, 12, 3238.	5.8	81
1520	CRISPR Screens in Toxicology Research: An Overview. <i>Current Protocols</i> , 2021, 1, e136.	1.3	5
1521	Current Applications and Future Perspectives of CRISPR-Cas9 for the Treatment of Lung Cancer. <i>Biologics: Targets and Therapy</i> , 2021, Volume 15, 199-204.	3.0	5
1522	Dissecting ELANE neutropenia pathogenicity by human HSC gene editing. <i>Cell Stem Cell</i> , 2021, 28, 833-845.e5.	5.2	23
1523	The SMC5/6 complex compacts and silences unintegrated HIV-1 DNA and is antagonized by Vpr. <i>Cell Host and Microbe</i> , 2021, 29, 792-805.e6.	5.1	49
1525	Ubiquitin-mediated DNA damage response is synthetic lethal with G-quadruplex stabilizer CX-5461. <i>Scientific Reports</i> , 2021, 11, 9812.	1.6	9
1528	Prediction of sgRNA Off-Target Activity in CRISPR/Cas9 Gene Editing Using Graph Convolution Network. <i>Entropy</i> , 2021, 23, 608.	1.1	8

#	ARTICLE	IF	CITATIONS
1531	Pooled CRISPR screening in pancreatic cancer cells implicates co-repressor complexes as a cause of multiple drug resistance via regulation of epithelial-to-mesenchymal transition. <i>BMC Cancer</i> , 2021, 21, 632.	1.1	13
1532	Proteomic Screens for Suppressors of Anoikis Identify IL1RAP as a Promising Surface Target in Ewing Sarcoma. <i>Cancer Discovery</i> , 2021, 11, 2884-2903.	7.7	51
1533	Discovering antiviral restriction factors and pathways using genetic screens. <i>Journal of General Virology</i> , 2021, 102, .	1.3	5
1534	Interrogating immune cells and cancer with CRISPR-Cas9. <i>Trends in Immunology</i> , 2021, 42, 432-446.	2.9	13
1536	Evaluating the cleavage efficacy of CRISPR-Cas9 sgRNAs targeting ineffective regions of <i>Arabidopsis thaliana</i> genome. <i>PeerJ</i> , 2021, 9, e11409.	0.9	5
1537	CRISPR-Cas system: a precise tool for plant genome editing. <i>Nucleus (India)</i> , 0, , 1.	0.9	2
1538	A ribonucleoprotein transfection strategy for CRISPR/Cas9-mediated gene editing and single cell cloning in rainbow trout cells. <i>Cell and Bioscience</i> , 2021, 11, 103.	2.1	5
1539	Exploring liver cancer biology through functional genetic screens. <i>Nature Reviews Gastroenterology and Hepatology</i> , 2021, 18, 690-704.	8.2	31
1540	Autophagy suppresses the formation of hepatocyte-derived cancer-initiating ductular progenitor cells in the liver. <i>Science Advances</i> , 2021, 7, .	4.7	24
1541	<i>In vivo</i> and <i>in vitro</i> human gene essentiality estimations capture contrasting functional constraints. <i>NAR Genomics and Bioinformatics</i> , 2021, 3, lqab063.	1.5	1
1542	Therapeutic and diagnostic relevance of Crispr technology. <i>Biomedicine and Pharmacotherapy</i> , 2021, 138, 111487.	2.5	3
1543	CRISPR/Cas9: Principle, Applications, and Delivery through Extracellular Vesicles. <i>International Journal of Molecular Sciences</i> , 2021, 22, 6072.	1.8	56
1544	Functional Validation of cas9/GuideRNA Constructs for Site-Directed Mutagenesis of Triticale ABA8 ^{OH1} loci. <i>International Journal of Molecular Sciences</i> , 2021, 22, 7038.	1.8	8
1545	CRISPR/Cas9 in cancer: An attempt to the present trends and future prospects. <i>Biotechnology and Applied Biochemistry</i> , 2022, 69, 1238-1251.	1.4	2
1546	A cleavage-based surrogate reporter for the evaluation of CRISPR-Cas9 cleavage efficiency. <i>Nucleic Acids Research</i> , 2021, 49, e85-e85.	6.5	4
1548	Genome-wide interrogation of gene functions through base editor screens empowered by barcoded sgRNAs. <i>Nature Biotechnology</i> , 2021, 39, 1403-1413.	9.4	34
1549	Exploiting DNA Endonucleases to Advance Mechanisms of DNA Repair. <i>Biology</i> , 2021, 10, 530.	1.3	7
1550	Chromatin Mechanisms Driving Cancer. <i>Cold Spring Harbor Perspectives in Biology</i> , 2022, 14, a040956.	2.3	9

#	ARTICLE	IF	CITATIONS
1551	CRISPR screens in physiologic medium reveal conditionally essential genes in human cells. <i>Cell Metabolism</i> , 2021, 33, 1248-1263.e9.	7.2	77
1552	VISPR-online: a web-based interactive tool to visualize CRISPR screening experiments. <i>BMC Bioinformatics</i> , 2021, 22, 344.	1.2	2
1553	A metabolic CRISPR-Cas9 screen in Chinese hamster ovary cells identifies glutamine-sensitive genes. <i>Metabolic Engineering</i> , 2021, 66, 114-122.	3.6	17
1554	PTGS2, CD133, CDK5 knockout comparison by CRISPR CAS-9 system in UV-Induced and Metastatic Melanoma. <i>Journal of Student Research</i> , 2021, 10, .	0.0	0
1555	Cellphone enabled point-of-care assessment of breast tumor cytology and molecular HER2 expression from fine-needle aspirates. <i>Npj Breast Cancer</i> , 2021, 7, 85.	2.3	8
1556	BTK inhibition sensitizes acute lymphoblastic leukemia to asparaginase by suppressing the amino acid response pathway. <i>Blood</i> , 2021, 138, 2383-2395.	0.6	13
1557	Deacetylation as a receptor-regulated direct activation switch for pannexin channels. <i>Nature Communications</i> , 2021, 12, 4482.	5.8	12
1559	CRISPR screening identifies CDK12 as a conservative vulnerability of prostate cancer. <i>Cell Death and Disease</i> , 2021, 12, 740.	2.7	19
1560	CRISPR/Cas9-Mediated Whole Genomic Wide Knockout Screening Identifies Specific Genes Associated With PM2.5-Induced Mineral Absorption in Liver Toxicity. <i>Frontiers in Bioengineering and Biotechnology</i> , 2021, 9, 669434.	2.0	6
1561	Negative Regulation of Erythroid Differentiation via the CBX8-TRIM28 Axis. <i>Molecules and Cells</i> , 2021, 44, 444-457.	1.0	4
1563	Massively parallel in vivo CRISPR screening identifies RNF20/40 as epigenetic regulators of cardiomyocyte maturation. <i>Nature Communications</i> , 2021, 12, 4442.	5.8	27
1564	CRISPR/ Cas9 Off-targets: Computational Analysis of Causes, Prediction, Detection, and Overcoming Strategies. <i>Current Bioinformatics</i> , 2022, 17, 119-132.	0.7	3
1565	Homology length dictates the requirement for Rad51 and Rad52 in gene targeting in the Basidiomycota yeast <i>Naganishia liquefaciens</i> . <i>Current Genetics</i> , 2021, 67, 919-936.	0.8	3
1567	Scribble sub-cellular localization modulates recruitment of YES1 to regulate YAP1 phosphorylation. <i>Cell Chemical Biology</i> , 2021, 28, 1235-1241.e5.	2.5	10
1568	Genome dependent Cas9/gRNA search time underlies sequence dependent gRNA activity. <i>Nature Communications</i> , 2021, 12, 5034.	5.8	28
1570	Targeting leukemia-specific dependence on the de novo purine synthesis pathway. <i>Leukemia</i> , 2022, 36, 383-393.	3.3	11
1571	An engineered transcriptional reporter of protein localization identifies regulators of mitochondrial and ER membrane protein trafficking in high-throughput CRISPRi screens. <i>ELife</i> , 2021, 10, .	2.8	17
1572	TALENSâ€™an indispensable tool in the era of CRISPR: a mini review. <i>Journal of Genetic Engineering and Biotechnology</i> , 2021, 19, 125.	1.5	41

#	ARTICLE	IF	CITATIONS
1574	Mutant resources for functional genomics in Dictyostelium discoideum using REMI-seq technology. BMC Biology, 2021, 19, 172.	1.7	15
1575	Predicting base editing outcomes with an attention-based deep learning algorithm trained on high-throughput target library screens. Nature Communications, 2021, 12, 5114.	5.8	36
1576	FKBP3 Induces Human Immunodeficiency Virus Type 1 Latency by Recruiting Histone Deacetylase 1/2 to the Viral Long Terminal Repeat. MBio, 2021, 12, e0079521.	1.8	4
1577	A Genome-Wide CRISPR/Cas9 Screen Reveals the Requirement of Host Sphingomyelin Synthase 1 for Infection with Pseudorabies Virus Mutant gDâ€“Pass. Viruses, 2021, 13, 1574.	1.5	9
1578	Chromatin Alterations in Neurological Disorders and Strategies of (Epi)Genome Rescue. Pharmaceuticals, 2021, 14, 765.	1.7	3
1580	MIC-Drop: A platform for large-scale in vivo CRISPR screens. Science, 2021, 373, 1146-1151.	6.0	36
1581	Analysis of combinatorial CRISPR screens with the Orthrus scoring pipeline. Nature Protocols, 2021, 16, 4766-4798.	5.5	7
1582	Designing libraries for pooled CRISPR functional screens of long noncoding RNAs. Mammalian Genome, 2022, 33, 312-327.	1.0	2
1583	Sonoâ€“Controllable and ROSâ€“Sensitive CRISPRâ€“Cas9 Genome Editing for Augmented/Synergistic Ultrasound Tumor Nanotherapy. Advanced Materials, 2021, 33, e2104641.	11.1	85
1584	CRISPR-Cas9 Genome Engineering: Trends in Medicine and Health. Mini-Reviews in Medicinal Chemistry, 2022, 22, 410-421.	1.1	10
1585	A new era in functional genomics screens. Nature Reviews Genetics, 2022, 23, 89-103.	7.7	104
1586	A simple and rapid method for enzymatic synthesis of CRISPR-Cas9 sgRNA libraries. Nucleic Acids Research, 2021, 49, e131-e131.	6.5	4
1588	Comparison of the Feasibility, Efficiency, and Safety of Genome Editing Technologies. International Journal of Molecular Sciences, 2021, 22, 10355.	1.8	24
1589	AR-negative prostate cancer is vulnerable to loss of JMJD1C demethylase. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	3.3	6
1590	Path to improving the life cycle and quality of genome-scale models of metabolism. Cell Systems, 2021, 12, 842-859.	2.9	16
1591	Application of CHyMErA Cas9-Cas12a combinatorial genome-editing platform for genetic interaction mapping and gene fragment deletion screening. Nature Protocols, 2021, 16, 4722-4765.	5.5	8
1592	Depletion of Demethylase KDM6 Enhances Early Neuroectoderm Commitment of Human PSCs. Frontiers in Cell and Developmental Biology, 2021, 9, 702462.	1.8	5
1594	LIN37-DREAM prevents DNA end resection and homologous recombination at DNA double-strand breaks in quiescent cells. ELife, 2021, 10, .	2.8	14

#	ARTICLE	IF	CITATIONS
1595	Smoothed Nested Testing on Directed Acyclic Graphs. <i>Biometrika</i> , 0, , .	1.3	1
1596	Roadmap for the use of base editors to decipher drug mechanism of action. <i>PLoS ONE</i> , 2021, 16, e0257537.	1.1	1
1597	Visualizing Live Chromatin Dynamics through CRISPR-Based Imaging Techniques. <i>Molecules and Cells</i> , 2021, 44, 627-636.	1.0	4
1598	Modulation of oxidative phosphorylation augments antineoplastic activity of mitotic aurora kinase inhibition. <i>Cell Death and Disease</i> , 2021, 12, 893.	2.7	6
1599	Naked-eye detection of site-specific ssRNA and ssDNA using PAMmer-assisted CRISPR/Cas9 coupling with exponential amplification reaction. <i>Talanta</i> , 2021, 233, 122554.	2.9	11
1600	SIRT7 gene knockout using CRISPR/Cas9 system enhances melanin production in the melanoma cells. <i>Biochimica Et Biophysica Acta - Molecular Basis of Disease</i> , 2021, 1867, 166219.	1.8	2
1601	Probing into the interactions between papers and patents of new CRISPR/CAS9 technology: A citation comparison. <i>Journal of Informetrics</i> , 2021, 15, 101189.	1.4	5
1602	Kaposi's sarcoma-associated herpesvirus at 27. <i>Tumour Virus Research</i> , 2021, 12, 200223.	1.5	8
1603	Towards a CRISPR understanding of homologous recombination with high-throughput functional genomics. <i>Current Opinion in Genetics and Development</i> , 2021, 71, 171-181.	1.5	6
1604	CRISPR-Cas9-mediated genome editing technology for abiotic stress tolerance in crop plant. , 2022, , 331-354.		4
1605	The evolution and history of gene editing technologies. <i>Progress in Molecular Biology and Translational Science</i> , 2021, 178, 1-62.	0.9	7
1606	KDM2B is involved in the epigenetic regulation of TGF- β -induced epithelial-mesenchymal transition in lung and pancreatic cancer cell lines. <i>Journal of Biological Chemistry</i> , 2021, 296, 100213.	1.6	14
1607	Genome-wide CRISPR screening reveals nucleotide synthesis negatively regulates autophagy. <i>Journal of Biological Chemistry</i> , 2021, 296, 100780.	1.6	9
1608	enAsCas12a Enables CRISPR-Directed Evolution to Screen for Functional Drug Resistance Mutations in Sequences Inaccessible to SpCas9. <i>Molecular Therapy</i> , 2021, 29, 208-224.	3.7	8
1609	Minimal genome-wide human CRISPR-Cas9 library. <i>Genome Biology</i> , 2021, 22, 40.	3.8	40
1610	High-content imaging-based pooled CRISPR screens in mammalian cells. <i>Journal of Cell Biology</i> , 2021, 220, .	2.3	53
1611	A genome-wide CRISPR-based screen identifies <i>KAT7</i> as a driver of cellular senescence. <i>Science Translational Medicine</i> , 2021, 13, .	5.8	79
1612	Using Genetic Engineering Techniques to Develop Banana Cultivars With Fusarium Wilt Resistance and Ideal Plant Architecture. <i>Frontiers in Plant Science</i> , 2020, 11, 617528.	1.7	24

#	ARTICLE	IF	CITATIONS
1613	A CRISPR/Cas9-Engineered <i>ARID1A</i> -Deficient Human Gastric Cancer Organoid Model Reveals Essential and Nonessential Modes of Oncogenic Transformation. <i>Cancer Discovery</i> , 2021, 11, 1562-1581.	7.7	75
1615	Genome-Scale CRISPR-Cas9 Transcriptional Activation Screening in Metformin Resistance Related Gene of Prostate Cancer. <i>Frontiers in Cell and Developmental Biology</i> , 2020, 8, 616332.	1.8	9
1616	DGK and DZHK position paper on genome editing: basic science applications and future perspective. <i>Basic Research in Cardiology</i> , 2021, 116, 2.	2.5	5
1617	Off-target effects in genome editing. , 2021, , 715-727.		1
1618	Genetic engineering in organoids. <i>Journal of Molecular Medicine</i> , 2021, 99, 555-568.	1.7	33
1619	CRISPR-Mediated Gene Targeting of Human Induced Pluripotent Stem Cells. <i>Current Protocols in Stem Cell Biology</i> , 2015, 35, 5A.8.1-5A.8.22.	3.0	21
1620	Establishment and Use of Mouse Haploid ES Cells. <i>Current Protocols in Mouse Biology</i> , 2015, 5, 155-185.	1.2	15
1621	Data Storage Based on DNA. <i>Small Structures</i> , 2021, 2, 2000046.	6.9	36
1622	Engineering T Cells Using CRISPR/Cas9 for Cancer Therapy. <i>Methods in Molecular Biology</i> , 2020, 2115, 419-433.	0.4	8
1623	CRISPR Guide RNA Design Guidelines for Efficient Genome Editing. <i>Methods in Molecular Biology</i> , 2020, 2166, 331-342.	0.4	10
1624	Molecular Genetics of Dysregulated pH Homeostasis. , 2014, , .		1
1625	Intracellular Parcel Service: Current Issues in Intracellular Membrane Trafficking. <i>Methods in Molecular Biology</i> , 2015, 1270, 1-12.	0.4	11
1626	CRISPR/Cas9-Mediated In Vitro Mutagenesis in GC-Like B Cells. <i>Methods in Molecular Biology</i> , 2017, 1623, 135-145.	0.4	5
1627	Precise and Efficient In-Frame Integration of an Exogenous GFP Tag in <i>Aspergillus fumigatus</i> by a CRISPR System. <i>Methods in Molecular Biology</i> , 2017, 1625, 249-258.	0.4	15
1628	Detection of CRISPR/Cas9-Induced Genomic Fragment Deletions in Barley and Generation of Homozygous Edited Lines via Embryogenic Pollen Culture. <i>Methods in Molecular Biology</i> , 2018, 1789, 9-20.	0.4	4
1629	CRISPR/Cas9 Editing in Induced Pluripotent Stem Cells: A Way Forward for Treating Cystic Fibrosis?. , 2019, , 153-178.		2
1630	Genome-Wide Genetic Screening in the Mammalian CNS. <i>Research and Perspectives in Neurosciences</i> , 2017, , 31-39.	0.4	1
1631	Application of Nanomaterials in Cancer Diagnosis, Drug Delivery, and Therapy. , 2020, , 147-171.		1

#	ARTICLE	IF	CITATIONS
1632	Functional Genomics for Cancer Drug Target Discovery. <i>Cancer Cell</i> , 2020, 38, 31-43.	7.7	46
1633	Systematic Identification of Regulators of Oxidative Stress Reveals Non-canonical Roles for Peroxisomal Import and the Pentose Phosphate Pathway. <i>Cell Reports</i> , 2020, 30, 1417-1433.e7.	2.9	49
1634	CRISPR-Cas systems: Overview, innovations and applications in human disease research and gene therapy. <i>Computational and Structural Biotechnology Journal</i> , 2020, 18, 2401-2415.	1.9	100
1635	CRISPR screens in the era of microbiomes. <i>Current Opinion in Microbiology</i> , 2020, 57, 70-77.	2.3	15
1636	Am I ready for CRISPR? A user's guide to genetic screens. <i>Nature Reviews Genetics</i> , 2018, 19, 67-80.	7.7	325
1637	Combined lentiviral- and RNA-mediated CRISPR/Cas9 delivery for efficient and traceable gene editing in human hematopoietic stem and progenitor cells. <i>Scientific Reports</i> , 2020, 10, 22393.	1.6	17
1638	Deletion of transcription factor binding motifs using the CRISPR/spCas9 system in the β -globin LCR. <i>Bioscience Reports</i> , 2017, 37, .	1.1	22
1639	PQLC2 recruits the C9orf72 complex to lysosomes in response to cationic amino acid starvation. <i>Journal of Cell Biology</i> , 2020, 219, .	2.3	42
1640	High-efficiency nonhomologous insertion of a foreign gene into the herpes simplex virus genome. <i>Journal of General Virology</i> , 2020, 101, 982-996.	1.3	7
1711	FAM111B enhances proliferation of <i>KRAS</i> -driven lung adenocarcinoma by degrading p16. <i>Cancer Science</i> , 2020, 111, 2635-2646.	1.7	31
1713	Constructing Reliable Protein-Protein Interaction (PPI) Networks. , 2017, , 15.		4
1714	Screening Genes Promoting Exit from Naive Pluripotency Based on Genome-Scale CRISPR-Cas9 Knockout. <i>Stem Cells International</i> , 2020, 2020, 1-15.	1.2	7
1715	Altered Mitochondria Functionality Defines a Metastatic Cell State in Lung Cancer and Creates an Exploitable Vulnerability. <i>Cancer Research</i> , 2021, 81, 567-579.	0.4	27
1716	Polymerase δ deficiency causes syndromic immunodeficiency with replicative stress. <i>Journal of Clinical Investigation</i> , 2019, 129, 4194-4206.	3.9	41
1717	CCAT1 is an enhancer-templated RNA that predicts BET sensitivity in colorectal cancer. <i>Journal of Clinical Investigation</i> , 2016, 126, 639-652.	3.9	185
1718	Endogenous transmembrane protein UT2 inhibits pSTAT3 and suppresses hematological malignancy. <i>Journal of Clinical Investigation</i> , 2016, 126, 1300-1310.	3.9	9
1719	CRISPR-Cas9 screen reveals a MYCN-amplified neuroblastoma dependency on EZH2. <i>Journal of Clinical Investigation</i> , 2017, 128, 446-462.	3.9	117
1720	Arrayed CRISPR Screening Identifies Novel Targets That Enhance the Productive Delivery of mRNA by MC3-Based Lipid Nanoparticles. <i>SLAS Discovery</i> , 2020, 25, 605-617.	1.4	14

#	ARTICLE	IF	CITATIONS
1722	shRNA-seq data analysis with edgeR. <i>F1000Research</i> , 0, 3, 95.	0.8	43
1724	Evaluation of RNAi and CRISPR technologies by large-scale gene expression profiling in the Connectivity Map. <i>PLoS Biology</i> , 2017, 15, e2003213.	2.6	136
1725	A machine learning approach for predicting CRISPR-Cas9 cleavage efficiencies and patterns underlying its mechanism of action. <i>PLoS Computational Biology</i> , 2017, 13, e1005807.	1.5	147
1726	CRISPR/Cas9 Allows Efficient and Complete Knock-In of a Destabilization Domain-Tagged Essential Protein in a Human Cell Line, Allowing Rapid Knockdown of Protein Function. <i>PLoS ONE</i> , 2014, 9, e95101.	1.1	38
1727	Efficient Mutagenesis by Cas9 Protein-Mediated Oligonucleotide Insertion and Large-Scale Assessment of Single-Guide RNAs. <i>PLoS ONE</i> , 2014, 9, e98186.	1.1	794
1728	Efficient Genome Engineering of <i>Toxoplasma gondii</i> Using CRISPR/Cas9. <i>PLoS ONE</i> , 2014, 9, e100450.	1.1	238
1729	Assessment of the Chemosensitizing Activity of TAT-RasGAP317-326 in Childhood Cancers. <i>PLoS ONE</i> , 2015, 10, e0120487.	1.1	8
1730	CRISPR-Mediated <i>Slamf1^{fl/fl}</i> <i>Slamf5^{fl/fl}</i> <i>Slamf6^{fl/fl}</i> Triple Gene Disruption Reveals NKT Cell Defects but Not T Follicular Helper Cell Defects. <i>PLoS ONE</i> , 2016, 11, e0156074.	1.1	14
1731	LIM-Only Protein 4 (LMO4) and LIM Domain Binding Protein 1 (LDB1) Promote Growth and Metastasis of Human Head and Neck Cancer (LMO4 and LDB1 in Head and Neck Cancer). <i>PLoS ONE</i> , 2016, 11, e0164804.	1.1	21
1732	A High-Throughput Strategy for Dissecting Mammalian Genetic Interactions. <i>PLoS ONE</i> , 2016, 11, e0167617.	1.1	4
1733	Validation of Synthetic CRISPR Reagents as a Tool for Arrayed Functional Genomic Screening. <i>PLoS ONE</i> , 2016, 11, e0168968.	1.1	36
1734	Creation of Novel Protein Variants with CRISPR/Cas9-Mediated Mutagenesis: Turning a Screening By-Product into a Discovery Tool. <i>PLoS ONE</i> , 2017, 12, e0170445.	1.1	50
1735	Using local chromatin structure to improve CRISPR/Cas9 efficiency in zebrafish. <i>PLoS ONE</i> , 2017, 12, e0182528.	1.1	29
1736	Highly efficient gene inactivation by adenoviral CRISPR/Cas9 in human primary cells. <i>PLoS ONE</i> , 2017, 12, e0182974.	1.1	44
1737	CRISPR-FOCUS: A web server for designing focused CRISPR screening experiments. <i>PLoS ONE</i> , 2017, 12, e0184281.	1.1	16
1738	CRISPR/Cas-based customization of pooled CRISPR libraries. <i>PLoS ONE</i> , 2018, 13, e0199473.	1.1	6
1739	Identification of unrecognized host factors promoting HIV-1 latency. <i>PLoS Pathogens</i> , 2020, 16, e1009055.	2.1	16
1740	The big bang of genome editing technology: development and application of the CRISPR/Cas9 system in disease animal models. <i>Zoological Research</i> , 2016, 37, 191-204.	0.6	13

#	ARTICLE	IF	CITATIONS
1741	Generation of genetically modified mice using CRISPR/Cas9 and haploid embryonic stem cell systems. <i>Zoological Research</i> , 2016, 37, 205-13.	0.6	9
1742	CRISPR Explorer: A fast and intuitive tool for designing guide RNA for genome editing. <i>Journal of Biological Methods</i> , 2016, 3, e56.	1.0	4
1743	Advances in genetic engineering of domestic animals. <i>Frontiers of Agricultural Science and Engineering</i> , 2016, 3, 1.	0.9	4
1744	Emerging Properties and Functional Consequences of Noncoding Transcription. <i>Genetics</i> , 2017, 207, 357-367.	1.2	42
1745	Genome editing, or CRISPR/CAS9 "a panacea for many incurable diseases or the first step to a gene apocalypse?. <i>Visnik Nacional Noi Akademii Nauk Ukraini</i> , 2020, 03, 50-77.	0.0	3
1746	Disruption of Phytoene Desaturase Gene using Transient Expression of Cas9: gRNA Complex. <i>International Journal of Agriculture and Biology</i> , 2016, , 990-996.	0.2	4
1747	Personalizing Medicine in Head and Neck Squamous Cell Carcinoma: The Rationale for Combination Therapies. <i>Medical Research Archives</i> , 2015, 3, .	0.1	15
1748	The reliable assurance of detecting somatic mutations in cancer-related genes by next-generation sequencing: the results of external quality assessment in China. <i>Oncotarget</i> , 2016, 7, 58500-58515.	0.8	11
1749	ZNF131 suppresses centrosome fragmentation in glioblastoma stem-like cells through regulation of HAUS5. <i>Oncotarget</i> , 2017, 8, 48545-48562.	0.8	19
1750	CRISPR-ON-Mediated KLF4 overexpression inhibits the proliferation, migration and invasion of urothelial bladder cancer <i>in vitro</i> and <i>in vivo</i> . <i>Oncotarget</i> , 2017, 8, 102078-102087.	0.8	13
1751	CRISPR/Cas9 genome-wide screening identifies KEAP1 as a sorafenib, lenvatinib, and regorafenib sensitivity gene in hepatocellular carcinoma. <i>Oncotarget</i> , 2019, 10, 7058-7070.	0.8	50
1752	Drugs in a Curative Combination Therapy for Lymphoma Exhibit Low Cross-Resistance But Not Pharmacological Synergy. <i>SSRN Electronic Journal</i> , 0, , .	0.4	3
1753	An Overview of Computational Tools of Nucleic Acid Binding Site Prediction for Site-specific Proteins and Nucleases. <i>Protein and Peptide Letters</i> , 2020, 27, 370-384.	0.4	2
1755	Keeping CRISPR/Cas on-Target. <i>Current Issues in Molecular Biology</i> , 2016, , .	1.0	21
1756	dCas9: A Versatile Tool for Epigenome Editing. <i>Current Issues in Molecular Biology</i> , 2018, 26, 15-32.	1.0	70
1757	CRISPR-Cas9 in agriculture: Approaches, applications, future perspectives, and associated challenges. <i>Malaysian Journal of Halal Research</i> , 2020, 3, 6-16.	0.3	13
1758	A network of human functional gene interactions from knockout fitness screens in cancer cells. <i>Life Science Alliance</i> , 2019, 2, e201800278.	1.3	81
1759	STAG1 vulnerabilities for exploiting cohesin synthetic lethality in STAG2-deficient cancers. <i>Life Science Alliance</i> , 2020, 3, e202000725.	1.3	19

#	ARTICLE	IF	CITATIONS
1760	Epigenetic Footprints of CRISPR/Cas9-Mediated Genome Editing in Plants. <i>Frontiers in Plant Science</i> , 2019, 10, 1720.	1.7	20
1761	Novel genetic therapeutic approaches for modulating the severity of β -thalassemia (Review). <i>Biomedical Reports</i> , 2020, 13, 1-1.	0.9	19
1762	Phenotypic screening using large-scale genomic libraries to identify drug targets for the treatment of cancer (Review). <i>Oncology Letters</i> , 2020, 19, 3617-3626.	0.8	7
1763	The CRISPR Growth Spurt: from Bench to Clinic on Versatile Small RNAs. <i>Journal of Microbiology and Biotechnology</i> , 2017, 27, 207-218.	0.9	17
1764	Development of CRISPR/Cas9 system for targeted DNA modifications and recent improvements in modification efficiency and specificity. <i>BMB Reports</i> , 2020, 53, 341-348.	1.1	4
1765	Gene editing for corneal disease management. <i>World Journal of Translational Medicine</i> , 2016, 5, 1.	3.5	5
1766	A forward genetic screen reveals novel independent regulators of ULBP1, an activating ligand for natural killer cells. <i>ELife</i> , 2015, 4, .	2.8	36
1767	Nucleosomes impede Cas9 access to DNA in vivo and in vitro. <i>ELife</i> , 2016, 5, .	2.8	349
1768	The anticancer natural product ophiobolin A induces cytotoxicity by covalent modification of phosphatidylethanolamine. <i>ELife</i> , 2016, 5, .	2.8	44
1769	Comparative genetic screens in human cells reveal new regulatory mechanisms in WNT signaling. <i>ELife</i> , 2016, 5, .	2.8	49
1770	Astrin-SKAP complex reconstitution reveals its kinetochore interaction with microtubule-bound Ndc80. <i>ELife</i> , 2017, 6, .	2.8	41
1771	GIPC proteins negatively modulate Plexin1 signaling during vascular development. <i>ELife</i> , 2019, 8, .	2.8	12
1772	A virus-packageable CRISPR screen identifies host factors mediating interferon inhibition of HIV. <i>ELife</i> , 2018, 7, .	2.8	115
1773	GREB1 amplifies androgen receptor output in human prostate cancer and contributes to antiandrogen resistance. <i>ELife</i> , 2019, 8, .	2.8	19
1774	Circular synthesized CRISPR/Cas gRNAs for functional interrogations in the coding and noncoding genome. <i>ELife</i> , 2019, 8, .	2.8	34
1775	A curative combination cancer therapy achieves high fractional cell killing through low cross-resistance and drug additivity. <i>ELife</i> , 2019, 8, .	2.8	78
1776	Robust cullin-RING ligase function is established by a multiplicity of poly-ubiquitylation pathways. <i>ELife</i> , 2019, 8, .	2.8	36
1777	Cancer systems immunology. <i>ELife</i> , 2020, 9, .	2.8	14

#	ARTICLE	IF	CITATIONS
1778	CRISPR screening identifies M1AP as a new MYC regulator with a promoter-reporter system. PeerJ, 2020, 8, e9046.	0.9	5
1780	The Application of the CRISPR/Cas9 System in the Treatment of Hepatitis B Liver Cancer. Technology in Cancer Research and Treatment, 2021, 20, 153303382110452.	0.8	1
1781	Adenovirus prevents dsRNA formation by promoting efficient splicing of viral RNA. Nucleic Acids Research, 2022, 50, 1201-1220.	6.5	10
1782	Interrogating Mitochondrial Biology and Disease Using CRISPR/Cas9 Gene Editing. Genes, 2021, 12, 1604.	1.0	10
1783	A FLASH pipeline for arrayed CRISPR library construction and the gene function discovery of rice receptor-like kinases. Molecular Plant, 2022, 15, 243-257.	3.9	22
1785	Engineering digitizer circuits for chemical and genetic screens in human cells. Nature Communications, 2021, 12, 6150.	5.8	4
1786	GCN2 adapts protein synthesis to scavenging-dependent growth. Cell Systems, 2022, 13, 158-172.e9.	2.9	12
1787	Genome-wide CRISPR-Cas9 screens identify mechanisms of BET bromodomain inhibitor sensitivity. iScience, 2021, 24, 103323.	1.9	5
1788	Generation and validation of CRISPR-engineered human natural killer cell lines for research and therapeutic applications. STAR Protocols, 2021, 2, 100874.	0.5	2
1790	Variations on a Theme: Crispr Models for 15q11-Q13 Disorders and Beyond. Brain Disorders & Therapy, 2014, 03, .	0.1	0
1791	A Genomic Analysis of Cellular Responses and Adaptions to Extracellular Acidosis. , 2014, , 135-157.		0
1792	The CRISPR-Cas9 System: A New Dawn in Gene Editing. OMICS Journal of Radiology, 2014, 06, .	0.0	0
1793	Developing CRISPR/Cas9 Technologies for Research and Medicine. MOJ Cell Science & Report, 2014, 1, .	0.1	0
1794	Editing Cultured Human Cells: From Cell Lines to iPS Cells. , 2015, , 45-69.		1
1798	Genome Editing in Human Pluripotent Stem Cells. Pancreatic Islet Biology, 2016, , 43-67.	0.1	0
1801	Mapping paths: new approaches to dissect eukaryotic signaling circuitry. F1000Research, 2016, 5, 1853.	0.8	0
1804	Characterising mechanisms of aberrant androgen receptor signalling in advanced prostate cancer. Endocrine Abstracts, 0, , .	0.0	0
1806	A CRISPR View of Biological Mechanisms. Discoveries, 2016, 4, e69.	1.5	2

#	ARTICLE	IF	CITATIONS
1808	A Method to Convert mRNA into a Guide RNA (gRNA) Library without Requiring Previous Bioinformatics Knowledge of the Organism. <i>Bio-protocol</i> , 2017, 7, e2319.	0.2	0
1810	Recent biotechnology tools contributing to the molecular-genetics analysis for non-model animals.. <i>Journal of Animal Genetics</i> , 2017, 45, 19-30.	0.5	0
1811	Dense sgRNA Library Construction Using a Molecular Chipper Approach. <i>Bio-protocol</i> , 2017, 7, .	0.2	0
1819	Optimizing Crispr Cas9 Genome Editing System:A Review. <i>International Journal of Endorsing Health Science Research (ijehsr)</i> , 2017, 5, 48.	0.0	0
1822	SysFinder: A customized platform for search, comparison and assisted design of appropriate animal models based on systematic similarity. <i>Journal of Genetics and Genomics</i> , 2017, 44, 251-258.	1.7	0
1842	Engineering of Human-Induced Pluripotent Stem Cells for Precise Disease Modeling. , 2018, , 369-411.		0
1843	Motor Neuron Disease-Associated Loss of Nuclear TDP-43 Is Linked to DNA Double-Strand Break Repair Defects. <i>SSRN Electronic Journal</i> , 0, , .	0.4	5
1844	The Functional Genomic Circuitry of Human Glioblastoma Stem Cells. <i>SSRN Electronic Journal</i> , 0, , .	0.4	0
1858	Deletion of FOXL2 by CRISPR promotes cell $\frac{1}{2}$ cycle G0/G1 restriction in KGN cells. <i>International Journal of Molecular Medicine</i> , 2019, 43, 567-574.	1.8	5
1863	CRISPR-based Technologies for Genome Engineering: Properties, Current Improvements and Applications in Medicine. <i>RSC Drug Discovery Series</i> , 2019, , 400-433.	0.2	1
1865	An Update on the Applications of CRISPR/Cas9 Technology in Tomato. <i>Energy, Environment, and Sustainability</i> , 2019, , 249-263.	0.6	0
1885	CRISPR/Cas9 Gene Targeting in Primary Mouse Bone Marrow-Derived Macrophages. <i>Methods in Molecular Biology</i> , 2020, 2097, 223-230.	0.4	3
1887	Construction of Minimal Genomes and Synthetic Cells. , 2020, , 45-67.		0
1889	Novel Approaches to Profile Functional Long Noncoding RNAs Associated with Stem Cell Pluripotency. <i>Current Genomics</i> , 2020, 21, 37-45.	0.7	2
1896	Establishment of a pig CRISPR/Cas9 knockout library for functional gene screening in pig cells. <i>Biotechnology Journal</i> , 2022, 17, e2100408.	1.8	6
1897	Computational Approaches for Designing Highly Specific and Efficient sgRNAs. <i>Methods in Molecular Biology</i> , 2022, 2349, 147-166.	0.4	0
1898	A Simple Method that Combines CRISPR and AID to Quickly Generate Conditional Knockouts for Essential Genes in Various Vertebrate Cell Lines. <i>Methods in Molecular Biology</i> , 2022, 2377, 109-122.	0.4	0
1900	Enabling cancer target validation with genetically encoded systems for ligand-induced protein degradation. <i>Current Research in Chemical Biology</i> , 2021, 1, 100011.	1.4	6

#	ARTICLE	IF	CITATIONS
1901	CRISPR/Cas-based Functional Genomic Approaches to Phenotypic Screening. RSC Drug Discovery Series, 2020, , 58-82.	0.2	0
1902	A CRISPR Competition Assay to Identify Cancer Genetic Dependencies. Bio-protocol, 2020, 10, e3682.	0.2	6
1903	CRISPR/Cas9-Based Genome Editing of the Saccharomyces cerevisiae ADE2 Gene with Restriction-Free Cloning and a Rapid Bam HI Digest Readout. Current Protocols in Essential Laboratory Techniques, 2020, 21, e45.	2.6	0
1905	High-Throughput CRISPR Screening Identifies Genes Involved in Macrophage Viability and Inflammatory Pathways. Cell Reports, 2020, 33, 108541.	2.9	25
1906	DENT-seq for genome-wide strand-specific identification of DNA single-strand break sites with single-nucleotide resolution. Genome Research, 2021, 31, 75-87.	2.4	6
1907	Gene Editing in Dimorphic Fungi Using CRISPR/Cas9. Current Protocols in Microbiology, 2020, 59, e132.	6.5	4
1908	CRISPR-mediated dense mutagenesis: a tool for rational targeting of multiprotein complexes and the noncoding genome. , 2022, , 57-64.		0
1909	Single-guide RNAs: rationale and design. , 2022, , 47-55.		1
1910	CRISPR-Cas orthologs and variants. , 2022, , 7-38.		0
1911	Unbiased and Tailored CRISPR/Cas gRNA Libraries by Synthesizing Covalently-closed-circular (3Cs) DNA. Bio-protocol, 2020, 10, e3472.	0.2	5
1913	CRISPR/Cas9 Guide RNA Design Rules for Predicting Activity. Methods in Molecular Biology, 2020, 2115, 351-364.	0.4	8
1914	No excessive mutations in transcription activator-like effector nuclease-mediated \pm -1,3-galactosyltransferase knockout Yucatan miniature pigs. Asian-Australasian Journal of Animal Sciences, 2020, 33, 360-372.	2.4	7
1923	Broadening the Toolkit for Quantitatively Evaluating Noncanonical Amino Acid Incorporation in Yeast. ACS Synthetic Biology, 2021, 10, 3094-3104.	1.9	9
1924	The oncomicropeptide APPLE promotes hematopoietic malignancy by enhancing translation initiation. Molecular Cell, 2021, 81, 4493-4508.e9.	4.5	38
1932	Chromosome instability induced by a single defined sister chromatid fusion. Life Science Alliance, 2020, 3, e202000911.	1.3	4
1933	A saturating mutagenesis CRISPR-Cas9-mediated functional genomic screen identifies cis- and trans-regulatory elements of Oct4 in murine ESCs. Journal of Biological Chemistry, 2020, 295, 15797-15809.	1.6	6
1934	CRISPR/Cas9-Mediated Genome Editing of Trichoderma reesei. Methods in Molecular Biology, 2021, 2234, 87-98.	0.4	8
1935	TALEN and CRISPR/Cas Genome Editing Systems: Tools of Discovery. Acta Naturae, 2014, 6, 19-40.	1.7	78

#	ARTICLE	IF	CITATIONS
1938	CRISPR screen in cancer: status quo and future perspectives. American Journal of Cancer Research, 2021, 11, 1031-1050.	1.4	4
1939	Excessive DNA damage mediates ECM degradation via the RBBP8/NOTCH1 pathway in sporadic aortic dissection. Biochimica Et Biophysica Acta - Molecular Basis of Disease, 2022, 1868, 166303.	1.8	8
1940	CRISPR/Cas System and Factors Affecting Its Precision and Efficiency. Frontiers in Cell and Developmental Biology, 2021, 9, 761709.	1.8	20
1941	Discovery of putative tumor suppressors from CRISPR screens reveals rewired lipid metabolism in acute myeloid leukemia cells. Nature Communications, 2021, 12, 6506.	5.8	13
1942	Mammalian chemical genomics towards identifying targets and elucidating modes of action of bioactive compounds. ChemBioChem, 2021, , .	1.3	2
1943	Optimizing sgRNA to Improve CRISPR/Cas9 Knockout Efficiency: Special Focus on Human and Animal Cell. Frontiers in Bioengineering and Biotechnology, 2021, 9, 775309.	2.0	11
1944	Applications of CRISPR-Cas Technologies to Proteomics. Genes, 2021, 12, 1790.	1.0	5
1945	Click chemistry-enabled CRISPR screening reveals GSK3 as a regulator of PLD signaling. Proceedings of the National Academy of Sciences of the United States of America, 2021, 118, .	3.3	14
1946	Discovering new biology with drug-resistance alleles. Nature Chemical Biology, 2021, 17, 1219-1229.	3.9	11
1948	Genome-wide CRISPR screen identifies CDK6 as a therapeutic target in adult T-cell leukemia/lymphoma. Blood, 2022, 139, 1541-1556.	0.6	23
1950	To Discover the Efficient and Novel Drug Targets in Human Cancers Using CRISPR/Cas Screening and Databases. International Journal of Molecular Sciences, 2021, 22, 12322.	1.8	8
1952	CRISPR-Cas9 sgRNA design and outcome assessment: Bioinformatics tools and aquaculture applications. Aquaculture and Fisheries, 2022, 7, 121-130.	1.2	14
1954	Optimized electroporation of CRISPR-Cas9/gRNA ribonucleoprotein complex for selection-free homologous recombination in human pluripotent stem cells. STAR Protocols, 2021, 2, 100965.	0.5	8
1955	Microfluidic tool for rapid functional characterization of CRISPR complexes. New Biotechnology, 2022, 68, 1-8.	2.4	3
1958	Modulating gene expression in breast cancer via DNA secondary structure and the CRISPR toolbox. NAR Cancer, 2021, 3, zcab048.	1.6	8
1959	An inducible CRISPR/Cas9 screen identifies DTX2 as a transcriptional regulator of human telomerase. IScience, 2022, 25, 103813.	1.9	6
1960	Transgelin: a new gene involved in LDL endocytosis identified by a genome-wide CRISPR-Cas9 screen. Journal of Lipid Research, 2022, 63, 100160.	2.0	10
1962	High-throughput methods for genome editing: the more the better. Plant Physiology, 2022, 188, 1731-1745.	2.3	10

#	ARTICLE	IF	CITATIONS
1963	History and Classification of CRISPR/Cas System. , 2022, , 29-52.		4
1964	MEK inhibition overcomes chemoimmunotherapy resistance by inducing CXCL10 in cancer cells. <i>Cancer Cell</i> , 2022, 40, 136-152.e12.	7.7	79
1965	Endogenous hydrogen peroxide can efficiently regulate CRISPR-Cas9 based gene editing. <i>New Journal of Chemistry</i> , 2022, 46, 2472-2477.	1.4	0
1966	CRISPR/Cas9 gene editing and natural variation analysis demonstrate the potential for <i>HvARE1</i> in improvement of nitrogen use efficiency in barley. <i>Journal of Integrative Plant Biology</i> , 2022, 64, 756-770.	4.1	27
1968	Classification of CRISPR/Cas system and its application in tomato breeding. <i>Theoretical and Applied Genetics</i> , 2022, 135, 367-387.	1.8	29
1969	Utilization of CRISPR-Mediated Tools for Studying Functional Genomics in Hematological Malignancies: An Overview on the Current Perspectives, Challenges, and Clinical Implications. <i>Frontiers in Genetics</i> , 2021, 12, 767298.	1.1	2
1970	Tailoring Cardiac Synthetic Transcriptional Modulation Towards Precision Medicine. <i>Frontiers in Cardiovascular Medicine</i> , 2021, 8, 783072.	1.1	1
1971	Key sequence features of CRISPR RNA for dual-guide CRISPR-Cas9 ribonucleoprotein complexes assembled with wild-type or HiFi Cas9. <i>Nucleic Acids Research</i> , 2022, 50, 2854-2871.	6.5	2
1972	Pooled genetic perturbation screens with image-based phenotypes. <i>Nature Protocols</i> , 2022, 17, 476-512.	5.5	21
1973	16pdel lipid changes in iPSC-derived neurons and function of FAM57B in lipid metabolism and synaptogenesis. <i>iScience</i> , 2022, 25, 103551.	1.9	8
1974	Pseudouridine synthases modify human pre-mRNA co-transcriptionally and affect pre-mRNA processing. <i>Molecular Cell</i> , 2022, 82, 645-659.e9.	4.5	75
1975	High-content CRISPR screening. <i>Nature Reviews Methods Primers</i> , 2022, 2, .	11.8	155
1976	High-content CRISPR screening. <i>Nature Reviews Methods Primers</i> , 2022, 2, .	11.8	24
1977	SuperDendrix algorithm integrates genetic dependencies and genomic alterations across pathways and cancer types. <i>Cell Genomics</i> , 2022, 2, 100099.	3.0	2
1978	Current approaches in CRISPR-Cas9 mediated gene editing for biomedical and therapeutic applications. <i>Journal of Controlled Release</i> , 2022, 343, 703-723.	4.8	25
1979	Valine tRNA levels and availability regulate complex I assembly in leukaemia. <i>Nature</i> , 2022, 601, 428-433.	13.7	34
1980	CRISPR-Cas9 Mutagenesis in <i>Xenopus tropicalis</i> for Phenotypic Analyses in the F ₀ Generation and Beyond. <i>Cold Spring Harbor Protocols</i> , 2022, 2022, pdb.prot106971.	0.2	9
1983	CRISPR Screen to Identify Factors that Render Tumor Cells Sensitive or Resistant to Killing by NK Cells. <i>Methods in Molecular Biology</i> , 2022, 2463, 269-288.	0.4	0

#	ARTICLE	IF	CITATIONS
1984	CRISPR Guide RNA Library Screens in Human Induced Pluripotent Stem Cells. <i>Methods in Molecular Biology</i> , 2022, , 1.	0.4	1
1985	CRISPR-Based Screening for Stress Response Factors in Mammalian Cells. <i>Methods in Molecular Biology</i> , 2022, 2428, 19-40.	0.4	0
1986	Dissecting Molecular Phenotypes Through FACS-Based Pooled CRISPR Screens. <i>Methods in Molecular Biology</i> , 2022, , 1-24.	0.4	7
1987	Current applications and future perspective of CRISPR/Cas9 gene editing in cancer. <i>Molecular Cancer</i> , 2022, 21, 57.	7.9	85
1988	Genome wide CRISPR/Cas9 screen identifies the coagulation factor IX (F9) as a regulator of senescence. <i>Cell Death and Disease</i> , 2022, 13, 163.	2.7	8
1990	CRISPR in cancer biology and therapy. <i>Nature Reviews Cancer</i> , 2022, 22, 259-279.	12.8	157
1991	CRISPR screening of E3 ubiquitin ligases reveals Ring Finger Protein 185 as a novel tumor suppressor in glioblastoma repressed by promoter hypermethylation and miR-587. <i>Journal of Translational Medicine</i> , 2022, 20, 96.	1.8	6
1992	Identification of New Regulators of Pancreatic Cancer Cell Sensitivity to Oxaliplatin and Cisplatin. <i>Molecules</i> , 2022, 27, 1289.	1.7	8
1993	CRISPR/Cas9-mediated genome-wide screening identifies a novel tumor suppressor in glioblastoma. <i>Chinese Science Bulletin</i> , 2022, , .		
1994	Identifying novel therapeutic targets in gastric cancer using genome-wide CRISPR-Cas9 screening. <i>Oncogene</i> , 2022, 41, 2069-2078.	2.6	12
1995	A Meta-Analysis of gRNA Library Screens Enables an Improved Understanding of the Impact of gRNA Folding and Structural Stability on CRISPR-Cas9 Activity. <i>CRISPR Journal</i> , 2022, 5, 146-154.	1.4	7
1996	Generation of CRISPR-Cas9-mediated genetic knockout human intestinal tissue-derived enteroid lines by lentivirus transduction and single-cell cloning. <i>Nature Protocols</i> , 2022, 17, 1004-1027.	5.5	23
2000	Genome-Wide Knockout Screen Identifies EGLN3 Involving in Ammonia Neurotoxicity. <i>Frontiers in Cell and Developmental Biology</i> , 2022, 10, 820692.	1.8	1
2002	CpG island reconfiguration for the establishment and synchronization of polycomb functions upon exit from naive pluripotency. <i>Molecular Cell</i> , 2022, 82, 1169-1185.e7.	4.5	10
2003	The emerging role of mass spectrometry-based proteomics in drug discovery. <i>Nature Reviews Drug Discovery</i> , 2022, 21, 637-654.	21.5	110
2004	CRISPR/Cas9-Based Functional Genomics in Human Induced Pluripotent Stem Cell-Derived Models: Can the Stars Align for Neurodegenerative Diseases?. <i>Movement Disorders</i> , 2022, 37, 886-890.	2.2	1
2005	Benchmarking of SpCas9 variants enables deeper base editor screens of BRCA1 and BCL2. <i>Nature Communications</i> , 2022, 13, 1318.	5.8	25
2006	CRISPR-Cas9 gRNA efficiency prediction: an overview of predictive tools and the role of deep learning. <i>Nucleic Acids Research</i> , 2022, 50, 3616-3637.	6.5	69

#	ARTICLE	IF	CITATIONS
2007	Cas13d: A New Molecular Scissor for Transcriptome Engineering. <i>Frontiers in Cell and Developmental Biology</i> , 2022, 10, 866800.	1.8	21
2009	Effect of CRISPR/Cas9-Edited PD-1/PD-L1 on Tumor Immunity and Immunotherapy. <i>Frontiers in Immunology</i> , 2022, 13, 848327.	2.2	11
2010	Computational Tools and Resources for CRISPR/Cas Genome Editing. <i>Genomics, Proteomics and Bioinformatics</i> , 2023, 21, 108-126.	3.0	51
2011	Principles and Applications of CRISPR Toolkit in Virus Manipulation, Diagnosis, and Virus-Host Interactions. <i>Cells</i> , 2022, 11, 999.	1.8	3
2012	CRISPR-Cas9 gene editing induced complex on-target outcomes in human cells. <i>Experimental Hematology</i> , 2022, 110, 13-19.	0.2	6
2013	LAMP2A regulates the loading of proteins into exosomes. <i>Science Advances</i> , 2022, 8, eabm1140.	4.7	69
2014	A general calculus of fitness landscapes finds genes under selection in cancers. <i>Genome Research</i> , 2022, , gr.275811.121.	2.4	7
2015	Genome-wide CRISPR-Cas9 screening identifies the CYTH2 host gene as a potential therapeutic target of influenza viral infection. <i>Cell Reports</i> , 2022, 38, 110559.	2.9	10
2016	Small-molecule targeted therapies induce dependence on DNA double-strand break repair in residual tumor cells. <i>Science Translational Medicine</i> , 2022, 14, eabc7480.	5.8	14
2017	OVOL2 impairs RHO GTPase signaling to restrain mitosis and aggressiveness of Anaplastic Thyroid Cancer. <i>Journal of Experimental and Clinical Cancer Research</i> , 2022, 41, 108.	3.5	6
2018	CNN-XG: A Hybrid Framework for sgRNA On-Target Prediction. <i>Biomolecules</i> , 2022, 12, 409.	1.8	6
2019	Genome-wide CRISPR Screening to Identify Drivers of TGF- β 2-Induced Liver Fibrosis in Human Hepatic Stellate Cells. <i>ACS Chemical Biology</i> , 2022, 17, 918-929.	1.6	7
2021	RAB18 is a key regulator of GalNAc-conjugated siRNA-induced silencing in Hep3B cells. <i>Molecular Therapy - Nucleic Acids</i> , 2022, 28, 423-434.	2.3	2
2023	DNA Input Classification by a Riboregulator-Based Cell-Free Perceptron. <i>ACS Synthetic Biology</i> , 2022, 11, 1510-1520.	1.9	8
2024	Development and Application of CRISPR-Cas Based Tools. <i>Frontiers in Cell and Developmental Biology</i> , 2022, 10, 834646.	1.8	13
2025	Recombinase-mediated cassette exchange-based screening of a CRISPR/Cas9 library for enhanced recombinant protein production in human embryonic kidney cells: Improving resistance to hyperosmotic stress. <i>Metabolic Engineering</i> , 2022, 72, 247-258.	3.6	5
2026	PDZ Proteins SCRIB and DLG1 Regulate Myeloma Cell Surface CD86 Expression, Growth, and Survival. <i>Molecular Cancer Research</i> , 2022, 20, 1122-1136.	1.5	3
2027	Establishment of cytochrome P450 1a gene-knockout Javanese medaka, <i>Oryzias javanicus</i> , which distinguishes toxicity modes of the polycyclic aromatic hydrocarbons, pyrene and phenanthrene. <i>Marine Pollution Bulletin</i> , 2022, 178, 113578.	2.3	4

#	ARTICLE	IF	CITATIONS
2028	SgRNA engineering for improved genome editing and expanded functional assays. <i>Current Opinion in Biotechnology</i> , 2022, 75, 102697.	3.3	12
2029	Breast tissue regeneration is driven by cell-matrix interactions coordinating multi-lineage stem cell differentiation through DDR1. <i>Nature Communications</i> , 2021, 12, 7116.	5.8	10
2030	AttCRISPR: a spacetime interpretable model for prediction of sgRNA on-target activity. <i>BMC Bioinformatics</i> , 2021, 22, 589.	1.2	11
2031	Tools for Decoding Ubiquitin Signaling in DNA Repair. <i>Frontiers in Cell and Developmental Biology</i> , 2021, 9, 760226.	1.8	4
2032	CRISPR Screens to Identify Regulators of Tumor Immunity. <i>Annual Review of Cancer Biology</i> , 2022, 6, 103-122.	2.3	5
2033	State-of-the-art CRISPR for in vivo and cell-based studies in <i>Drosophila</i> . <i>Trends in Genetics</i> , 2022, 38, 437-453.	2.9	26
2034	Common computational tools for analyzing CRISPR screens. <i>Emerging Topics in Life Sciences</i> , 2021, 5, 779-788.	1.1	10
2035	iCRISEE: an integrative analysis of CRISPR screen by reducing false positive hits. <i>Briefings in Bioinformatics</i> , 2022, 23, .	3.2	1
2036	Gene editing and its applications in biomedicine. <i>Science China Life Sciences</i> , 2022, 65, 660-700.	2.3	20
2037	The use of base editing technology to characterize single nucleotide variants. <i>Computational and Structural Biotechnology Journal</i> , 2022, 20, 1670-1680.	1.9	4
2038	Developing CRISPR/Cas9-Mediated Fluorescent Reporter Human Pluripotent Stem-Cell Lines for High-Content Screening. <i>Molecules</i> , 2022, 27, 2434.	1.7	2
2040	CRISPR-Click Enables Dual-Gene Editing with Modular Synthetic sgRNAs. <i>Bioconjugate Chemistry</i> , 2022, 33, 858-868.	1.8	2
2054	CRISPR-Based Screening in Three-Dimensional Organoid Cultures to Identify TGF- β 2 Pathway Regulators. <i>Methods in Molecular Biology</i> , 2022, 2488, 99-111.	0.4	2
2056	Characteristic and inheritance analysis of targeted mutagenesis mediated by genome editing in rice. <i>Yi Chuan = Hereditas / Zhongguo Yi Chuan Xue Hui Bian Ji</i> , 2016, 38, 746-55.	0.1	1
2057	Lessons from a genome-wide CRISPR-Cas9 screening: what researchers should know before start.. <i>EXCLI Journal</i> , 2021, 20, 1615-1620.	0.5	0
2059	CRISPR-Cas9 library screening approach for anti-cancer drug discovery: overview and perspectives. <i>Theranostics</i> , 2022, 12, 3329-3344.	4.6	16
2060	Development of a Novel Reference Material for Tumor Mutational Burden Measurement Based on CRISPR/Cas9 Technology. <i>Frontiers in Oncology</i> , 2022, 12, 845636.	1.3	1
2061	Stepwise-edited, human melanoma models reveal mutationsâ€™ effect on tumor and microenvironment. <i>Science</i> , 2022, 376, eabi8175.	6.0	24

#	ARTICLE	IF	CITATIONS
2063	Comprehensive Analysis of CRISPR-Cas9 Editing Outcomes in Yeast <i>Xanthophyllomyces dendrorhous</i> . <i>CRISPR Journal</i> , 2022, 5, 558-570.	1.4	2
2064	ISL2 is a putative tumor suppressor whose epigenetic silencing reprograms the metabolism of pancreatic cancer. <i>Developmental Cell</i> , 2022, 57, 1331-1346.e9.	3.1	9
2065	Novel roles of RTN4 and CLIMP-63 in regulating mitochondrial structure, bioenergetics and apoptosis. <i>Cell Death and Disease</i> , 2022, 13, 436.	2.7	7
2066	CRISPR/Cas9-Mediated Genome Editing for <i>Pseudomonas fulva</i> , a Novel <i>Pseudomonas</i> Species with Clinical, Animal, and Plant-Associated Isolates. <i>International Journal of Molecular Sciences</i> , 2022, 23, 5443.	1.8	3
2067	Application and Prospect of CRISPR/Cas9 Technology in Reversing Drug Resistance of Non-Small Cell Lung Cancer. <i>Frontiers in Pharmacology</i> , 2022, 13, .	1.6	2
2068	A genome-wide CRISPR-Cas9 knockout screen identifies essential and growth-restricting genes in human trophoblast stem cells. <i>Nature Communications</i> , 2022, 13, 2548.	5.8	25
2069	AURKA and PLK1 inhibition selectively and synergistically block cell cycle progression in diffuse midline glioma. <i>IScience</i> , 2022, 25, 104398.	1.9	10
2070	DNA-PK promotes DNA end resection at DNA double strand breaks in G0 cells. <i>ELife</i> , 2022, 11, .	2.8	11
2071	Developments in high-throughput functional epigenomics: CRISPR-single-cell assay for transposase-accessible chromatin using sequencing screens. <i>Epigenomics</i> , 2022, , .	1.0	0
2075	CRISPR/Cas9 gRNA activity depends on free energy changes and on the target PAM context. <i>Nature Communications</i> , 2022, 13, .	5.8	31
2076	dbEssLnc: A manually curated database of human and mouse essential lncRNA genes. <i>Computational and Structural Biotechnology Journal</i> , 2022, 20, 2657-2663.	1.9	5
2077	Epigenetic regulation of T cell exhaustion. <i>Nature Immunology</i> , 2022, 23, 848-860.	7.0	82
2081	CRISPR/Cas9 and genetic screens in malaria parasites: small genomes, big impact. <i>Biochemical Society Transactions</i> , 2022, 50, 1069-1079.	1.6	7
2082	Using population selection and sequencing to characterize natural variation of starvation resistance in <i>Caenorhabditis elegans</i> . <i>ELife</i> , 0, 11, .	2.8	4
2084	Controllable assembly of synthetic constructs with programmable ternary DNA interaction. <i>Nucleic Acids Research</i> , 2022, 50, 7188-7196.	6.5	4
2085	Bridging Glycomics and Genomics: New Uses of Functional Genetics in the Study of Cellular Glycosylation. <i>Frontiers in Molecular Biosciences</i> , 0, 9, .	1.6	3
2086	CRISPR-Cas9-Based Technology and Its Relevance to Gene Editing in Parkinson's Disease. <i>Pharmaceutics</i> , 2022, 14, 1252.	2.0	18
2087	Synthetic Vulnerabilities in the KRAS Pathway. <i>Cancers</i> , 2022, 14, 2837.	1.7	3

#	ARTICLE	IF	CITATIONS
2088	Chemogenetic profiling reveals PP2A-independent cytotoxicity of proposed PP2A activators iHAP1 and DTa61. <i>EMBO Journal</i> , 2022, 41, .	3.5	14
2089	Genome-wide CRISPR screens of T cell exhaustion identify chromatin remodeling factors that limit T cell persistence. <i>Cancer Cell</i> , 2022, 40, 768-786.e7.	7.7	104
2091	Rapid Whole-Genome Identification of High Quality CRISPR Guide RNAs with the Crackling Method. <i>CRISPR Journal</i> , 2022, 5, 410-421.	1.4	2
2092	CRISPR: A Promising Tool for Cancer Therapy. <i>Current Molecular Medicine</i> , 2022, 22, .	0.6	0
2094	Application and prospects of high-throughput screening for <i>in vitro</i> neurogenesis. <i>World Journal of Stem Cells</i> , 2022, 14, 393-419.	1.3	1
2095	Downregulation of HINFP induces senescence-associated secretory phenotype to promote metastasis in a non-cell-autonomous manner in bladder cancer. <i>Oncogene</i> , 2022, 41, 3587-3598.	2.6	8
2096	Genome-Wide CRISPR-Cas9 Screening and Identification of Potential Genes Promoting Prostate Cancer Growth and Metastasis. <i>Current Cancer Drug Targets</i> , 2023, 23, 71-86.	0.8	3
2097	Genome-Wide CRISPR/Cas9 Library Screening Identified that DUSP4 Deficiency Induces Lenvatinib Resistance in Hepatocellular Carcinoma. <i>International Journal of Biological Sciences</i> , 2022, 18, 4357-4371.	2.6	17
2098	Generating Custom Pooled CRISPR Libraries for Genetic Dissection of Biological Pathways. <i>Methods in Molecular Biology</i> , 2022, , 333-347.	0.4	1
2099	Optimal LentiCRISPR-Based System for Sequential CRISPR/Cas9 Screens. <i>ACS Synthetic Biology</i> , 2022, 11, 2259-2266.	1.9	0
2101	<i>Pseudomonas aeruginosa</i> : pathogenesis, virulence factors, antibiotic resistance, interaction with host, technology advances and emerging therapeutics. <i>Signal Transduction and Targeted Therapy</i> , 2022, 7, .	7.1	239
2103	CASPER: An Integrated Software Platform for Rapid Development of CRISPR Tools. <i>CRISPR Journal</i> , 2022, 5, 609-617.	1.4	3
2104	Systematic exploration of optimized base editing gRNA design and pleiotropic effects with BExplorer. <i>Genomics, Proteomics and Bioinformatics</i> , 2022, , .	3.0	0
2105	A Novel Anti-Cancer Therapy: CRISPR/Cas9 Gene Editing. <i>Frontiers in Pharmacology</i> , 0, 13, .	1.6	10
2106	ZetaSuite: computational analysis of two-dimensional high-throughput data from multi-target screens and single-cell transcriptomics. <i>Genome Biology</i> , 2022, 23, .	3.8	1
2107	Natural killer cells in antitumour adoptive cell immunotherapy. <i>Nature Reviews Cancer</i> , 2022, 22, 557-575.	12.8	208
2108	Programming of Regulatory T Cells In Situ for Nerve Regeneration and Long-Term Patency of Vascular Grafts. <i>Research</i> , 2022, 2022, .	2.8	3
2110	Advanced Cellular Models for Preclinical Drug Testing: From 2D Cultures to Organ-on-a-Chip Technology. <i>Cancers</i> , 2022, 14, 3692.	1.7	5

#	ARTICLE	IF	CITATIONS
2112	Human papillomaviruses sensitize cells to DNA damage induced apoptosis by targeting the innate immune sensor cGAS. <i>PLoS Pathogens</i> , 2022, 18, e1010725.	2.1	13
2113	NBBt-test: a versatile method for differential analysis of multiple types of RNA-seq data. <i>Scientific Reports</i> , 2022, 12, .	1.6	1
2114	Application of CRISPR-Cas9 Gene Editing for HIV Host Factor Discovery and Validation. <i>Pathogens</i> , 2022, 11, 891.	1.2	1
2115	A Novel CRISPR-MultiTargeter Multi-agent Reinforcement learning (CMT-MARL) algorithm to identify editable target regions using a Hybrid scoring from multiple similar sequences. <i>Applied Intelligence</i> , 2023, 53, 9562-9579.	3.3	0
2116	aRNAque: an evolutionary algorithm for inverse pseudoknotted RNA folding inspired by LÃ©vy flights. <i>BMC Bioinformatics</i> , 2022, 23, .	1.2	2
2117	CaSilico: A versatile CRISPR package for in silico CRISPR RNA designing for Cas12, Cas13, and Cas14. <i>Frontiers in Bioengineering and Biotechnology</i> , 0, 10, .	2.0	3
2118	Precise somatic genome editing for treatment of inborn errors of immunity. <i>Frontiers in Immunology</i> , 0, 13, .	2.2	1
2119	EPIKOL, a chromatin-focused CRISPR/Cas9-based screening platform, to identify cancer-specific epigenetic vulnerabilities. <i>Cell Death and Disease</i> , 2022, 13, .	2.7	4
2121	Short open reading frame genes in innate immunity: from discovery to characterization. <i>Trends in Immunology</i> , 2022, 43, 741-756.	2.9	9
2122	CRISPR/Cas9 Technology and Its Utility for Crop Improvement. <i>International Journal of Molecular Sciences</i> , 2022, 23, 10442.	1.8	12
2123	Identification of Drug Resistance Mechanisms Using Genome-Wide CRISPR-Cas9 Screens. <i>Methods in Molecular Biology</i> , 2022, , 141-156.	0.4	1
2124	Utilizing Directed Evolution to Interrogate and Optimize CRISPR/Cas Guide RNA Scaffolds. <i>SSRN Electronic Journal</i> , 0, , .	0.4	0
2125	Modeling Schizophrenia In Vitro: Challenges and Insights on Studying Brain Cells. <i>Advances in Experimental Medicine and Biology</i> , 2022, , 35-51.	0.8	0
2126	Identification of Genes Regulating Hepatocyte Injury by a Genome-Wide CRISPR-Cas9 Screen. <i>Methods in Molecular Biology</i> , 2022, , 227-251.	0.4	0
2127	Estrogen Receptor Alpha and ESR1 Mutations in Breast Cancer. <i>Advances in Experimental Medicine and Biology</i> , 2022, , 171-194.	0.8	2
2128	The application of genome-wide CRISPR-Cas9 screens to dissect the molecular mechanisms of toxins. <i>Computational and Structural Biotechnology Journal</i> , 2022, 20, 5076-5084.	1.9	7
2129	Rapid in vivo multiplexed editing (RIME) of the adult mouse liver. <i>Hepatology</i> , 2023, 78, 486-502.	3.6	5
2133	An Important Role for RPRD1B in the Heat Shock Response. <i>Molecular and Cellular Biology</i> , 2022, 42, .	1.1	2

#	ARTICLE	IF	CITATIONS
2135	Genome-wide CRISPR/Cas9 screen identifies etoposide response modulators associated with clinical outcomes in pediatric AML. <i>Blood Advances</i> , 2023, 7, 1769-1783.	2.5	5
2136	Double-strand break toxicity is chromatin context independent. <i>Nucleic Acids Research</i> , 2022, 50, 9930-9947.	6.5	8
2137	De novo sphingolipid biosynthesis necessitates detoxification in cancer cells. <i>Cell Reports</i> , 2022, 40, 111415.	2.9	5
2138	A comprehensive overview of CRISPR/Cas 9 technology and application thereof in drug discovery. <i>Journal of Cellular Biochemistry</i> , 2022, 123, 1674-1698.	1.2	7
2139	Cellular Target Deconvolution of Small Molecules Using a Selection-Based Genetic Screening Platform. <i>ACS Central Science</i> , 2022, 8, 1424-1434.	5.3	3
2140	CLN3 is required for the clearance of glycerophosphodiester from lysosomes. <i>Nature</i> , 2022, 609, 1005-1011.	13.7	48
2141	<scp>DNA</scp> polymerase delta interacting protein 3 facilitates the activation and maintenance of <scp>DNA</scp> damage checkpoint in response to replication stress. <i>Animal Models and Experimental Medicine</i> , 2022, 5, 461-469.	1.3	5
2142	Paradoxical Increase of Permeability and Lipophilicity with the Increasing Topological Polar Surface Area within a Series of PRMT5 Inhibitors. <i>Journal of Medicinal Chemistry</i> , 2022, 65, 12386-12402.	2.9	5
2144	De novo assembly and annotation of the CHOZN [®] GS genome supports high-throughput genome-scale screening. <i>Biotechnology and Bioengineering</i> , 0, , .	1.7	4
2145	The phospholipid flippase ATP8B1 is required for lysosomal fusion in macrophages. <i>Cell Biochemistry and Function</i> , 0, , .	1.4	1
2146	Inhibition of the CtBP complex and FBXO11 enhances MHC class II expression and anti-cancer immune responses. <i>Cancer Cell</i> , 2022, 40, 1190-1206.e9.	7.7	7
2147	Accounting for small variations in the tracrRNA sequence improves sgRNA activity predictions for CRISPR screening. <i>Nature Communications</i> , 2022, 13, .	5.8	10
2148	MLL regulates the actin cytoskeleton and cell migration by stabilising Rho GTPases via the expression of RhoGDI1. <i>Journal of Cell Science</i> , 2022, 135, .	1.2	3
2149	A competitive precision CRISPR method to identify the fitness effects of transcription factor binding sites. <i>Nature Biotechnology</i> , 0, , .	9.4	3
2152	Nanoparticle-based CRISPR/Cas Delivery: An Emerging Tactic for Cancer Therapy. <i>Current Medicinal Chemistry</i> , 2023, 30, 3562-3581.	1.2	1
2154	CRISPR/Cas9: A revolutionary genome editing tool for human cancers treatment. <i>Technology in Cancer Research and Treatment</i> , 2022, 21, 153303382211320.	0.8	9
2155	Evaluation of efficiency prediction algorithms and development of ensemble model for CRISPR/Cas9 sgRNA selection. <i>Bioinformatics</i> , 2022, 38, 5175-5181.	1.8	6
2156	The efficient generation of knockout microglia cells using a dual-sgRNA strategy by CRISPR/Cas9. <i>Frontiers in Molecular Neuroscience</i> , 0, 15, .	1.4	1

#	ARTICLE	IF	CITATIONS
2157	BoostMEC: predicting CRISPR-Cas9 cleavage efficiency through boosting models. BMC Bioinformatics, 2022, 23, .	1.2	3
2158	Application of CRISPR/Cas Systems in the Nucleic Acid Detection of Infectious Diseases. Diagnostics, 2022, 12, 2455.	1.3	13
2160	A Novel CRISPR Interference Effector Enabling Functional Gene Characterization with Synthetic Guide RNAs. CRISPR Journal, 2022, 5, 769-786.	1.4	2
2161	Adding a Chemical Biology Twist to CRISPR Screening. Israel Journal of Chemistry, 0, , .	1.0	0
2162	CEDA: integrating gene expression data with CRISPR-pooled screen data identifies essential genes with higher expression. Bioinformatics, 2022, 38, 5245-5252.	1.8	1
2163	FBXO34 promotes latent HIV-1 activation by post-transcriptional modulation. Emerging Microbes and Infections, 2022, 11, 2785-2799.	3.0	2
2164	Viral protein engagement of GBF1 induces host cell vulnerability through synthetic lethality. Journal of Cell Biology, 2022, 221, .	2.3	6
2165	CRISPRon/off: CRISPR/Cas9 on- and off-target gRNA design. Bioinformatics, 2022, 38, 5437-5439.	1.8	9
2166	Genome-wide CRISPR Screen Reveal Targets of Chiral Gold(I) Anticancer Compound in Mammalian Cells. ACS Omega, 2022, 7, 39197-39205.	1.6	2
2167	A Genome-Wide CRISPR-Cas9 Loss-of-Function Screening to Identify Host Restriction Factors Modulating Oncolytic Virotherapy. Methods in Molecular Biology, 2023, , 379-399.	0.4	1
2169	A comprehensive Bioconductor ecosystem for the design of CRISPR guide RNAs across nucleases and technologies. Nature Communications, 2022, 13, .	5.8	10
2170	Inactivating a herbicide-resistance transgene in Nicotiana tabacum plants using CRISPR/Cas9. Plant Gene, 2022, 32, 100387.	1.4	1
2171	Screening and identification of CNIH4 gene associated with cell proliferation in gastric cancer based on a large-scale CRISPR-Cas9 screening database DepMap. Gene, 2023, 850, 146961.	1.0	7
2172	Genetic scissors•CRISPR/Cas9 genome editing cutting-edge biocarrier technology for bone and cartilage repair. Bioactive Materials, 2023, 22, 254-273.	8.6	7
2173	Studying Virus-Host Interactions with CRISPR Technology. Methods in Molecular Biology, 2023, , 105-117.	0.4	0
2174	CRISPR/Cas9 Genome-Editing Technology and Potential Clinical Application in Gastric Cancer. Genes, 2022, 13, 2029.	1.0	2
2175	Bio-Orthogonal Chemistry Conjugation Strategy Facilitates Investigation of N-methyladenosine and Thiouridine Guide RNA Modifications on CRISPR Activity. CRISPR Journal, 2022, 5, 787-798.	1.4	4
2176	The phenotypic landscape of essential human genes. Cell, 2022, 185, 4634-4653.e22.	13.5	45

#	ARTICLE	IF	CITATIONS
2177	Pooled genetic screens with image-based profiling. <i>Molecular Systems Biology</i> , 2022, 18, .	3.2	8
2178	Genome-scale CRISPR screening in a single mouse liver. <i>Cell Genomics</i> , 2022, 2, 100217.	3.0	7
2179	Epigenetic silencing by the SMC5/6 complex mediates HIV-1 latency. <i>Nature Microbiology</i> , 2022, 7, 2101-2113.	5.9	10
2180	Applying CRISPR-Cas9 screens to dissect hematological malignancies. <i>Blood Advances</i> , 2023, 7, 2252-2270.	2.5	2
2181	Could artificial intelligence revolutionize the development of nanovectors for gene therapy and mRNA vaccines?. <i>Nano Today</i> , 2022, 47, 101665.	6.2	11
2182	EpiCas-DL: Predicting sgRNA activity for CRISPR-mediated epigenome editing by deep learning. <i>Computational and Structural Biotechnology Journal</i> , 2023, 21, 202-211.	1.9	5
2183	Recent trends and advances of RNA interference (RNAi) to improve agricultural crops and enhance their resilience to biotic and abiotic stresses. <i>Plant Physiology and Biochemistry</i> , 2023, 194, 600-618.	2.8	11
2184	Elevated FSP1 protects KRAS-mutated cells from ferroptosis during tumor initiation. <i>Cell Death and Differentiation</i> , 2023, 30, 442-456.	5.0	35
2185	High-content CRISPR screening in tumor immunology. <i>Frontiers in Immunology</i> , 0, 13, .	2.2	3
2186	A review on bioinformatics advances in CRISPR-Cas technology. <i>Journal of Plant Biochemistry and Biotechnology</i> , 2023, 32, 791-807.	0.9	1
2187	Multiplexed engineering and precision gene editing in cellular immunotherapy. <i>Frontiers in Immunology</i> , 0, 13, .	2.2	4
2188	Long noncoding RNA study: Genome-wide approaches. <i>Genes and Diseases</i> , 2023, 10, 2491-2510.	1.5	2
2189	Massively Parallel CRISPR-Based Genetic Perturbation Screening at Single-Cell Resolution. <i>Advanced Science</i> , 2023, 10, .	5.6	6
2191	Genome editing advancements in potato (<i>Solanum tuberosum</i> L.): operational challenges and solutions. <i>Journal of Plant Biochemistry and Biotechnology</i> , 2023, 32, 730-742.	0.9	5
2192	Achieving single nucleotide sensitivity in direct hybridization genome imaging. <i>Nature Communications</i> , 2022, 13, .	5.8	2
2193	Targeting the Lysosomal Degradation of Rab22a-NeoF1 Fusion Protein for Osteosarcoma Lung Metastasis. <i>Advanced Science</i> , 2023, 10, .	5.6	6
2196	CRISPR-Cas-Guided Mutagenesis of Chromosome and Virulence Plasmid in <i>Shigella flexneri</i> by Cytosine Base Editing. <i>MSystems</i> , 0, , .	1.7	0
2197	Clustered regularly interspaced short palindromic repeats screens in pediatric tumours: A review. <i>Clinical and Translational Discovery</i> , 2022, 2, .	0.2	0

#	ARTICLE	IF	CITATIONS
2199	A CRISPR Platform for Targeted In Vivo Screens. <i>Methods in Molecular Biology</i> , 2023, , 397-409.	0.4	0
2200	Entry receptors are the gateway to alphavirus infection. <i>Journal of Clinical Investigation</i> , 2023, 133, .	3.9	14
2201	Deep mutational scanning of essential bacterial proteins can guide antibiotic development. <i>Nature Communications</i> , 2023, 14, .	5.8	14
2202	The interferon stimulated gene-encoded protein HELZ2 inhibits human LINE-1 retrotransposition and LINE-1 RNA-mediated type I interferon induction. <i>Nature Communications</i> , 2023, 14, .	5.8	10
2203	Application of CRISPR-Cas9 for Functional Analysis in <i>A. mexicanus</i> . <i>Neuromethods</i> , 2023, , 193-220.	0.2	0
2204	Deep mutational scanning: A versatile tool in systematically mapping genotypes to phenotypes. <i>Frontiers in Genetics</i> , 0, 14, .	1.1	6
2205	Efficient generation of lower induced motor neurons by coupling Ngn2 expression with developmental cues. <i>Cell Reports</i> , 2023, 42, 111896.	2.9	7
2206	Bifunctional cancer cell-based vaccine concomitantly drives direct tumor killing and antitumor immunity. <i>Science Translational Medicine</i> , 2023, 15, .	5.8	18
2207	An interactive web application for processing, correcting, and visualizing genome-wide pooled CRISPR-Cas9 screens. <i>Cell Reports Methods</i> , 2023, 3, 100373.	1.4	3
2208	Molecular Landscape of Tourette's Disorder. <i>International Journal of Molecular Sciences</i> , 2023, 24, 1428.	1.8	0
2210	CRISPR/Cas9-induced Mutation of <i>Sex Peptide Receptor</i> Gene Affects Ovary, Egg Laying, and Female Fecundity in <i>Bactrocera dorsalis</i> (Hendel) (Diptera: Tephritidae). <i>Journal of Insect Science</i> , 2023, 23, .	0.6	3
2211	A universal sequencing read interpreter. <i>Science Advances</i> , 2023, 9, .	4.7	3
2212	sgRNA-2wPSM: Identify sgRNAs on-target activity by combining two-window-based position specific mismatch and synthetic minority oversampling technique. <i>Computers in Biology and Medicine</i> , 2022, , 106489.	3.9	0
2213	ZBTB18 restricts chromatin accessibility and prevents transcriptional adaptations that drive metastasis. <i>Science Advances</i> , 2023, 9, .	4.7	3
2214	Inducible CRISPRi-Based Operon Silencing and Selective in <i>Trans</i> Gene Complementation in <i>Borrelia burgdorferi</i> . <i>Journal of Bacteriology</i> , 2023, 205, .	1.0	3
2216	Strategies for generation of mice via CRISPR/HDR-mediated knock-in. <i>Molecular Biology Reports</i> , 2023, 50, 3189-3204.	1.0	5
2218	Gene Modulation with CRISPR-based Tools in Human iPSC-Cardiomyocytes. <i>Stem Cell Reviews and Reports</i> , 0, , .	1.7	3
2219	Generation, storage, and utilizations of mutant libraries. , 2023, , 403-420.		0

#	ARTICLE	IF	CITATIONS
2220	Visualizing the Nucleome Using the CRISPR-Cas9 System: From in vitro to in vivo. <i>Biochemistry (Moscow)</i> , 2023, 88, S123-S149.	0.7	1
2221	A high-content flow cytometry and dual CRISPR-Cas9 based platform to quantify genetic interactions. <i>Methods in Cell Biology</i> , 2024, , 299-312.	0.5	0
2223	Hybrid Multitask Learning Reveals Sequence Features Driving Specificity in the CRISPR/Cas9 System. <i>Biomolecules</i> , 2023, 13, 641.	1.8	3
2224	Enhanced microalgal lipid production for biofuel using different strategies including genetic modification of microalgae: A review. <i>Progress in Energy and Combustion Science</i> , 2023, 96, 101071.	15.8	59
2225	GOLGA8 increases bulk antisense oligonucleotide uptake and activity in mammalian cells. <i>Molecular Therapy - Nucleic Acids</i> , 2023, 32, 289-301.	2.3	2
2226	Genome Editing. , 2021, , 287-297.		0
2227	E3 ubiquitin ligase ASB8 promotes selinexor-induced proteasomal degradation of XPO1. <i>Biomedicine and Pharmacotherapy</i> , 2023, 160, 114305.	2.5	3
2228	Identifying CDC7 as a synergistic target of chemotherapy in resistant small-cell lung cancer via CRISPR/Cas9 screening. <i>Cell Death Discovery</i> , 2023, 9, .	2.0	3
2229	Modeling CRISPR-Cas13d on-target and off-target effects using machine learning approaches. <i>Nature Communications</i> , 2023, 14, .	5.8	14
2230	CRISPR-based large-scale modeling of loss-of-function mutations to investigate mechanisms of stress resistance in cancer. <i>STAR Protocols</i> , 2023, 4, 102097.	0.5	0
2231	Revolutionizing DNA repair research and cancer therapy with CRISPR-Cas screens. <i>Nature Reviews Molecular Cell Biology</i> , 2023, 24, 477-494.	16.1	17
2232	Optimization of Genomewide CRISPR Screens Using AsCas12a and Multi-Guide Arrays. <i>CRISPR Journal</i> , 2023, 6, 75-82.	1.4	2
2233	CRISPR-Cas9: A Potent Gene-editing Tool for the Treatment of Cancer. <i>Current Molecular Medicine</i> , 2024, 24, 191-204.	0.6	1
2235	EVL and MIM/MTSS1 regulate actin cytoskeletal remodeling to promote dendritic filopodia in neurons. <i>Journal of Cell Biology</i> , 2023, 222, .	2.3	4
2236	Immunomodulation—a general review of the current state-of-the-art and new therapeutic strategies for targeting the immune system. <i>Frontiers in Immunology</i> , 0, 14, .	2.2	12
2237	Brain metastasis in breast cancer: focus on genes and signaling pathways involved, blood-brain barrier and treatment strategies. <i>Clinical and Translational Oncology</i> , 2023, 25, 1218-1241.	1.2	4
2238	SCREE: a comprehensive pipeline for single-cell multi-modal CRISPR screen data processing and analysis. <i>Briefings in Bioinformatics</i> , 2023, 24, .	3.2	2
2239	Analyzing CRISPR screens in non-conventional microbes. <i>Journal of Industrial Microbiology and Biotechnology</i> , 2023, 50, .	1.4	2

#	ARTICLE	IF	CITATIONS
2241	Mapping cellular responses to DNA double-strand breaks using CRISPR technologies. Trends in Genetics, 2023, , .	2.9	0
2242	Multi-Knockâ€”a multi-targeted genome-scale CRISPR toolbox to overcome functional redundancy in plants. Nature Plants, 2023, 9, 572-587.	4.7	14
2243	N-terminal acetylation can stabilize proteins independent of their ubiquitination. Scientific Reports, 2023, 13, .	1.6	3
2245	Optimized whole-genome CRISPR interference screens identify ARID1A-dependent growth regulators in human induced pluripotent stem cells. Stem Cell Reports, 2023, , .	2.3	3
2246	Spatial Transcriptomics: Technical Aspects of Recent Developments and Their Applications in Neuroscience and Cancer Research. Advanced Science, 2023, 10, .	5.6	7
2248	Understanding neural development and diseases using CRISPR screens in human pluripotent stem cell-derived cultures. Frontiers in Cell and Developmental Biology, 0, 11, .	1.8	1
2249	Noncoding translation mitigation. Nature, 2023, 617, 395-402.	13.7	19
2250	CRISPR/Cas9 genetic screens in hepatocellular carcinoma gene discovery. Current Research in Biotechnology, 2023, 5, 100127.	1.9	1
2251	KaryoCreate: A CRISPR-based technology to study chromosome-specific aneuploidy by targeting human centromeres. Cell, 2023, 186, 1985-2001.e19.	13.5	16
2252	Transient and tunable CRISPRa regulation of APOBEC/AID genes for targeting hepatitis B virus. Molecular Therapy - Nucleic Acids, 2023, 32, 478-493.	2.3	2
2253	CRISPR-Comboâ€”mediated orthogonal genome editing and transcriptional activation for plant breeding. Nature Protocols, 2023, 18, 1760-1794.	5.5	5
2254	Using traditional machine learning and deep learning methods for on- and off-target prediction in CRISPR/Cas9: a review. Briefings in Bioinformatics, 2023, 24, .	3.2	8
2255	CasKAS: direct profiling of genome-wide dCas9 and Cas9 specificity using ssDNA mapping. Genome Biology, 2023, 24, .	3.8	2
2256	Genomeâ€”wide screen for anticancer drug resistance in haploid human embryonic stem cells. Cell Proliferation, 2023, 56, .	2.4	0
2262	Target Validation for Medicinal Chemists. , 2023, , 653-681.		1
2267	Long noncoding RNA in human cancers: to be or not to be, that is the question. , 2023, , 109-127.		0
2268	Dead-Seq: Discovering Synthetic Lethal Interactions from Dead Cells Genomics. Methods in Molecular Biology, 2023, , 329-342.	0.4	0
2292	Exploring Plant-Microbe Interaction Through the Lens of Genome Editing. , 2023, , 243-272.		0

#	ARTICLE	IF	CITATIONS
2304	Computational tools and scientometrics for CRISPR-based genome editing. Journal of Plant Biochemistry and Biotechnology, 0, , .	0.9	1
2325	Drug Repositioning Using Genome-wide Screening and Systems Biology Approaches and Applications. , 2023, , 31-51.		0
2333	A Comparison of Machine Learning Models for Predicting CRISPR/Cas On-target Efficacy. , 2023, , .		0
2357	Visualizing and Subtyping Tumor Ecosystem. , 2023, , 609-636.		0
2361	Methods and Techniques to Select Efficient Guides for CRISPR-Mediated Genome Editing in Plants. , 2024, , 89-117.		0
2364	Modern Tools of Genome Engineering and Their Applications. , 2023, , 193-232.		0
2386	The CRISPR-Cas technology: trends in healthcare. , 2024, , 109-130.		0
2391	CRISPR-Cas9: chronology and evolution. , 2024, , 3-21.		0
2408	CRISPR-based precision breeding of fruits, vegetables, and ornamental plants. , 2024, , 191-216.		0
2412	CRISPR applications in medicinal and aromatic plants. , 2024, , 365-380.		0