Constance L Cepko

List of Publications by Year
in descending order

140 papers	20,701 citations	12330 69 h-index	12272 133 g-index
161 all docs	161 docs citations	161 times ranked	18113 citing authors

#	Article	IF	Citations
1	Development and diversification of bipolar interneurons in the mammalian retina. Developmental Biology, 2022, 481, 30-42.	2.0	15
2	Spatiotemporal patterns of neuronal subtype genesis suggest hierarchical development of retinal diversity. Cell Reports, 2022, 38, 110191.	6.4	14
3	Mouse Lines with Cre-mediated Recombination in Retinal Amacrine Cells. ENeuro, 2022, , ENEURO.0255-21.2021.	1.9	0
4	Targeting Microglia to Treat Degenerative Eye Diseases. Frontiers in Immunology, 2022, 13, 843558.	4.8	24
5	Retinoic acid signaling mediates peripheral cone photoreceptor survival in a mouse model of retina degeneration. ELife, 2022, 11, .	6.0	13
6	Nrf2 overexpression rescues the RPE in mouse models of retinitis pigmentosa. JCI Insight, 2021, 6, .	5.0	33
7	Engineering adeno-associated viral vectors to evade innate immune and inflammatory responses. Science Translational Medicine, 2021, 13, .	12.4	99
8	AAV-Txnip prolongs cone survival and vision in mouse models of retinitis pigmentosa. ELife, 2021, 10, .	6.0	30
9	<i>Cis</i>-regulatory dissection of cone development reveals a broad role for Otx2 and Oc transcription factors. Development (Cambridge), 2021, 148, .	2.5	9
10	Augmentation of CD47/SIRPÎ± signaling protects cones in genetic models of retinal degeneration. JCI Insight, 2021, 6, .	5.0	7
11	Clinical Assessment and Validation of a Rapid and Sensitive SARS-CoV-2 Test Using Reverse Transcription Loop-Mediated Isothermal Amplification Without the Need for RNA Extraction. Open Forum Infectious Diseases, 2021, 8, ofaa631.	0.9	36
12	FIN-Seq: transcriptional profiling of specific cell types from frozen archived tissue of the human central nervous system. Nucleic Acids Research, 2020, 48, e4.	14.5	13
13	Enhancer transcription identifies <i>cis</i>-regulatory elements for photoreceptor cell types. Development (Cambridge), 2020, 147, .	2.5	18
14	In Situ Detection of Adeno-associated Viral Vector Genomes with SABER-FISH. Molecular Therapy - Methods and Clinical Development, 2020, 19, 376-386.	4.1	18
15	SARS-CoV-2 detection using isothermal amplification and a rapid, inexpensive protocol for sample inactivation and purification. Proceedings of the National Academy of Sciences of the United States of America, 2020, 117, 24450-24458.	7.1	223
16	Cell type- and stage-specific expression of Otx2 is regulated by multiple transcription factors and<i>cis</i>-regulatory modules in the retina. Development (Cambridge), 2020, 147, .	2.5	23
17	Optimizing Nervous System-Specific Gene Targeting with Cre Driver Lines: Prevalence of Germline Recombination and Influencing Factors. Neuron, 2020, 106, 37-65.e5.	8.1	109
18	Microglia modulation by TGF-Î²1 protects cones in mouse models of retinal degeneration. Journal of Clinical Investigation, 2020, 130, 4360-4369.	8.2	45

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19	Probe-Seq: Method for RNA Sequencing of Specific Cell Types from Animal Tissue. Bio-protocol, 2020, 10, e3749.	0.4	0
20	SABER amplifies FISH: enhanced multiplexed imaging of RNA and DNA in cells and tissues. Nature Methods, 2019, 16, 533-544.	19.0	271
21	Soluble CX3CL1 gene therapy improves cone survival and function in mouse models of retinitis pigmentosa. Proceedings of the National Academy of Sciences of the United States of America, 2019, 116, 10140-10149.	7.1	35
22	AAV <i>cis</i> -regulatory sequences are correlated with ocular toxicity. Proceedings of the National Academy of Sciences of the United States of America, 2019, 116, 5785-5794.	7.1	158
23	Probe-Seq enables transcriptional profiling of specific cell types from heterogeneous tissue by RNA-based isolation. ELife, 2019, 8, .	6.0	26
24	In Vivo Functional Imaging of Retinal Neurons Using Red and Green Fluorescent Calcium Indicators. Advances in Experimental Medicine and Biology, 2018, 1074, 135-144.	1.6	2
25	Dentate granule cell recruitment of feedforward inhibition governs engram maintenance and remote memory generalization. Nature Medicine, 2018, 24, 438-449.	30.7	115
26	Fgf8 Expression and Degradation of Retinoic Acid Are Required for Patterning a High-Acuity Area in the Retina. Developmental Cell, 2017, 42, 68-81.e6.	7.0	77
27	The brain parenchyma has a type I interferon response that can limit virus spread. Proceedings of the National Academy of Sciences of the United States of America, 2017, 114, E95-E104.	7.1	49
28	Viral Delivery of GFP-Dependent Recombinases to the Mouse Brain. Methods in Molecular Biology, 2017, 1642, 109-126.	0.9	7
29	Glycolytic reliance promotes anabolism in photoreceptors. ELife, 2017, 6, .	6.0	129
30	Photoreceptor Fate Determination in the Vertebrate Retina. , 2016, 57, ORSFe1.		18
31	Comprehensive Classification of Retinal Bipolar Neurons by Single-Cell Transcriptomics. Cell, 2016, 166, 1308-1323.e30.	28.9	1,010
32	Anterograde or Retrograde Transsynaptic Circuit Tracing in Vertebrates with Vesicular Stomatitis Virus Vectors. Current Protocols in Neuroscience, 2016, 74, 1.26.1-1.26.27.	2.6	26
33	Distinct Expression Patterns of AAV8 Vectors with Broadly Active Promoters from Subretinal Injections of Neonatal Mouse Eyes at Two Different Ages. Advances in Experimental Medicine and Biology, 2016, 854, 501-507.	1.6	6
34	Detection and manipulation of live antigen-expressing cells using conditionally stable nanobodies. ELife, 2016, 5, .	6.0	77
35	The Determination of Rod and Cone Photoreceptor Fate. Annual Review of Vision Science, 2015, 1, 211-234.	4.4	47
36	Preferential Budding of Vesicular Stomatitis Virus from the Basolateral Surface of Polarized Epithelial Cells Is Not Solely Directed by Matrix Protein or Glycoprotein. Journal of Virology, 2015, 89, 11718-11722.	3.4	7

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37	Embryonic Origin of Postnatal Neural Stem Cells. Cell, 2015, 161, 1644-1655.	28.9	403
38	Neuroanatomy goes viral!. Frontiers in Neuroanatomy, 2015, 9, 80.	1.7	135
39	Vesicular stomatitis virus enables gene transfer and transsynaptic tracing in a wide range of organisms. Journal of Comparative Neurology, 2015, 523, 1639-1663.	1.6	59
40	Cell typeâ€“specific manipulation with GFP-dependent Cre recombinase. Nature Neuroscience, 2015, 18, 1334-1341.	14.8	74
41	Clonally Related Forebrain Interneurons Disperse Broadly across Both Functional Areas and Structural Boundaries. Neuron, 2015, 87, 989-998.	8.1	99
42	Wide Dispersion and Diversity of Clonally Related Inhibitory Interneurons. Neuron, 2015, 87, 999-1007.	8.1	84
43	NRF2 promotes neuronal survival in neurodegeneration and acute nerve damage. Journal of Clinical Investigation, 2015, 125, 1433-1445.	8.2	217
44	A Gene Regulatory Network Controls the Binary Fate Decision of Rod and Bipolar Cells in the Vertebrate Retina. Developmental Cell, 2014, 30, 513-527.	7.0	162
45	The Lgr5 transgene is expressed specifically in glycinergic amacrine cells in the mouse retina. Experimental Eye Research, 2014, 119, 106-110.	2.6	19
46	Cell Fate Determination of Photoreceptor Cells. , 2014, , 217-244.		1
47	A Nanobody-Based System Using Fluorescent Proteins as Scaffolds for Cell-Specific Gene Manipulation. Cell, 2013, 154, 928-939.	28.9	104
48	Otx2 and Onecut1 Promote the Fates of Cone Photoreceptors and Horizontal Cells and Repress Rod Photoreceptors. Developmental Cell, 2013, 26, 59-72.	7.0	119
49	Analysis of gene expression in wildâ€type and Notch1 mutant retinal cells by single cell profiling. Developmental Dynamics, 2013, 242, 1147-1159.	1.8	19
50	Transsynaptic Tracing with Vesicular Stomatitis Virus Reveals Novel Retinal Circuitry. Journal of Neuroscience, 2013, 33, 35-51.	3.6	54
51	Notch1 is required in newly postmitotic cells to inhibit the rod photoreceptor fate. Development (Cambridge), 2013, 140, 3188-3197.	2.5	63
52	Pseudotyped retroviruses for infecting axolotl <i>in vivo</i> and <i>in vitro</i>. Development (Cambridge), 2013, 140, 1137-1146.	2.5	48
53	Lineage Analysis of the Late Otocyst Stage Mouse Inner Ear by Transuterine Microinjection of A Retroviral Vector Encoding Alkaline Phosphatase and an Oligonucleotide Library. PLoS ONE, 2013, 8, e69314.	2.5	20
54	Vesicular stomatitis virus with the rabies virus glycoprotein directs retrograde transsynaptic transport among neurons in vivo. Frontiers in Neural Circuits, 2013, 7, 11.	2.8	52

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55	Transcription factor <i>Olig2</i> defines subpopulations of retinal progenitor cells biased toward specific cell fates. Proceedings of the National Academy of Sciences of the United States of America, 2012, 109, 7882-7887.	7.1	128
56	Emerging Gene Therapies for Retinal Degenerations. Journal of Neuroscience, 2012, 32, 6415-6420.	3.6	32
57	Loss of Daylight Vision in Retinal Degeneration: Are Oxidative Stress and Metabolic Dysregulation to Blame?. Journal of Biological Chemistry, 2012, 287, 1642-1648.	3.4	161
58	Viral Tracing of Genetically Defined Neural Circuitry. Journal of Visualized Experiments, 2012, , .	0.3	3
59	Gene expression changes within MÃ¼ller glial cells in retinitis pigmentosa. Molecular Vision, 2012, 18, 1197-214.	1.1	74
60	Conditional expression of the TVA receptor allows clonal analysis of descendents from Cre-expressing progenitor cells. Developmental Biology, 2011, 353, 309-320.	2.0	55
61	Identification of a retina-specific Otx2 enhancer element active in immature developing photoreceptors. Developmental Biology, 2011, 360, 241-255.	2.0	63
62	A Class of Human Proteins that Deliver Functional Proteins into Mammalian Cells InÂVitro and InÂVivo. Chemistry and Biology, 2011, 18, 833-838.	6.0	98
63	NeuroD Factors Regulate Cell Fate and Neurite Stratification in the Developing Retina. Journal of Neuroscience, 2011, 31, 7365-7379.	3.6	94
64	Anterograde or retrograde transsynaptic labeling of CNS neurons with vesicular stomatitis virus vectors. Proceedings of the National Academy of Sciences of the United States of America, 2011, 108, 15414-15419.	7.1	172
65	Seeing the Light of Day. Science, 2010, 329, 403-404.	12.6	14
66	Alternative splicing produces high levels of noncoding isoforms of bHLH transcription factors during development. Genes and Development, 2010, 24, 229-234.	5.9	8
67	Analysis of Thyroid Response Element Activity during Retinal Development. PLoS ONE, 2010, 5, e13739.	2.5	33
68	Developmental sources of conservation and variation in the evolution of the primate eye. Proceedings of the National Academy of Sciences of the United States of America, 2009, 106, 8963-8968.	7.1	72
69	Development and diversification of retinal amacrine interneurons at single cell resolution. Proceedings of the National Academy of Sciences of the United States of America, 2009, 106, 9495-9500.	7.1	110
70	Development and neurogenic potential of MÃ¼ller glial cells in the vertebrate retina. Progress in Retinal and Eye Research, 2009, 28, 249-262.	15.5	199
71	Identification of genes expressed preferentially in the developing peripheral margin of the optic cup. Developmental Dynamics, 2009, 238, 2327-2329.	1.8	44
72	Robust marking of photoreceptor cells and pinealocytes with several reporters under control of the <i>Crx</i> gene. Developmental Dynamics, 2009, 238, 3218-3225.	1.8	18

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73	Stimulation of the insulin/mTOR pathway delays cone death in a mouse model of retinitis pigmentosa. Nature Neuroscience, 2009, 12, 44-52.	14.8	443
74	HDAC4 Regulates Neuronal Survival in Normal and Diseased Retinas. Science, 2009, 323, 256-259.	12.6	180
75	Temporal order of bipolar cell genesis in the neural retina. Neural Development, 2008, 3, 2.	2.4	65
76	Thyroid hormone components are expressed in three sequential waves during development of the chick retina. BMC Developmental Biology, 2008, 8, 101.	2.1	64
77	Identification of molecular markers of bipolar cells in the murine retina. Journal of Comparative Neurology, 2008, 507, 1795-1810.	1.6	109
78	The transcriptome of retinal MÃ¼ller glial cells. Journal of Comparative Neurology, 2008, 509, 225-238.	1.6	343
79	Ultrasoundâ€guided in utero injections allow studies of the development and function of the eye. Developmental Dynamics, 2008, 237, 1034-1042.	1.8	29
80	Light-activated channels targeted to ON bipolar cells restore visual function in retinal degeneration. Nature Neuroscience, 2008, 11, 667-675.	14.8	522
81	Temporal requirement of the alternative-splicing factor <i>Sfrs1</i>for the survival of retinal neurons. Development (Cambridge), 2008, 135, 3923-3933.	2.5	15
82	A Core Paired-Type and POU Homeodomain-Containing Transcription Factor Program Drives Retinal Bipolar Cell Gene Expression. Journal of Neuroscience, 2008, 28, 7748-7764.	3.6	105
83	Individual Retinal Progenitor Cells Display Extensive Heterogeneity of Gene Expression. PLoS ONE, 2008, 3, e1588.	2.5	163
84	A typology of photoreceptor gene expression patterns in the mouse. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 12069-12074.	7.1	96
85	Controlled expression of transgenes introduced byin vivoelectroporation. Proceedings of the National Academy of Sciences of the United States of America, 2007, 104, 1027-1032.	7.1	588
86	Molecular heterogeneity of developing retinal ganglion and amacrine cells revealed through single cell gene expression profiling. Journal of Comparative Neurology, 2007, 502, 1047-1065.	1.6	147
87	Local Retinal Circuits of Melanopsin-Containing Ganglion Cells Identified by Transsynaptic Viral Tracing. Current Biology, 2007, 17, 981-988.	3.9	165
88	The Cis-regulatory Logic of the Mammalian Photoreceptor Transcriptional Network. PLoS ONE, 2007, 2, e643.	2.5	133
89	RCAS-RNAi: A loss-of-function method for the developing chick retina. BMC Developmental Biology, 2006, 6, 2.	2.1	56
90	Wnt2b/Î²-catenin-mediated canonical Wnt signaling determines the peripheral fates of the chick eye. Development (Cambridge), 2006, 133, 3167-3177.	2.5	136

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91	Notch 1 inhibits photoreceptor production in the developing mammalian retina. Development (Cambridge), 2006, 133, 913-923.	2.5	207
92	Notch activity permits retinal cells to progress through multiple progenitor states and acquire a stem cell property. Proceedings of the National Academy of Sciences of the United States of America, 2006, 103, 18998-19003.	7.1	155
93	Synaptogenesis and outer segment formation are perturbed in the neural retina of Crx mutant mice. BMC Neuroscience, 2005, 6, 5.	1.9	69
94	A Hybrid Photoreceptor Expressing Both Rod and Cone Genes in a Mouse Model of Enhanced S-Cone Syndrome. PLoS Genetics, 2005, 1, e11.	3.5	145
95	Retinoic acid regulates the expression of dorsoventral topographic guidance molecules in the chick retina. Development (Cambridge), 2005, 132, 5147-5159.	2.5	39
96	A POU factor binding site upstream of the Chx10 homeobox gene is required for Chx10 expression in subsets of retinal progenitor cells and bipolar cells. Developmental Biology, 2005, 281, 240-255.	2.0	37
97	The Rod Photoreceptor Pattern Is Set at the Optic Vesicle Stage and Requires Spatially Restricted cVax Expression. Journal of Neuroscience, 2005, 25, 2823-2831.	3.6	19
98	Transdifferentiation of the retina into pigmented cells in ocular retardation mice defines a new function of the homeodomain gene Chx10. Development (Cambridge), 2004, 131, 5139-5152.	2.5	148
99	Electroporation and RNA interference in the rodent retina <i>in vivo</i> and <i>in vitro</i>. Proceedings of the National Academy of Sciences of the United States of America, 2004, 101, 16-22.	7.1	978
100	Genetic analysis of the homeodomain transcription factor Chx10 in the retina using a novel multifunctional BAC transgenic mouse reporter. Developmental Biology, 2004, 271, 388-402.	2.0	283
101	Genomic Analysis of Mouse Retinal Development. PLoS Biology, 2004, 2, e247.	5.6	550
102	Prox1 function controls progenitor cell proliferation and horizontal cell genesis in the mammalian retina. Nature Genetics, 2003, 34, 53-58.	21.4	364
103	The chicken<i>RaxL</i>gene plays a role in the initiation of photoreceptor differentiation. Development (Cambridge), 2002, 129, 5363-5375.	2.5	276
104	The Dorsalâ€"Ventral Axis of the Neural Retina Is Divided into Multiple Domains of Restricted Gene Expression Which Exhibit Features of Lineage Compartments. Developmental Biology, 2002, 251, 59-73.	2.0	49
105	The Mouse<i>Crx</i>5â€²-Upstream Transgene Sequence Directs Cell-Specific and Developmentally Regulated Expression in Retinal Photoreceptor Cells. Journal of Neuroscience, 2002, 22, 1640-1647.	3.6	76
106	Large-Scale Preparation and Concentration of Retrovirus Stocks. , 2001, Chapter 9, Unit9.12.		10
107	Comprehensive Analysis of Photoreceptor Gene Expression and the Identification of Candidate Retinal Disease Genes. Cell, 2001, 107, 579-589.	28.9	286
108	The p57Kip2 cyclin kinase inhibitor is expressed by a restricted set of amacrine cells in the rodent retina. Journal of Comparative Neurology, 2001, 429, 601-614.	1.6	44

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109	Tackling the brain's genetic complexity. Nature Neuroscience, 2001, 4, 1159-1160.	14.8	1
110	Ectopic expression of Olig1 promotes oligodendrocyte formation and reduces neuronal survival in developing mouse cortex. Nature Neuroscience, 2001, 4, 973-974.	14.8	108
111	Regulating proliferation during retinal development. Nature Reviews Neuroscience, 2001, 2, 333-342.	10.2	220
112	Mutations in a new photoreceptor-pineal gene on 17p cause Leber congenital amaurosis. Nature Genetics, 2000, 24, 79-83.	21.4	257
113	Control of MÃ¼ller glial cell proliferation and activation following retinal injury. Nature Neuroscience, 2000, 3, 873-880.	14.8	400
114	Late Retinal Progenitor Cells Show Intrinsic Limitations in the Production of Cell Types and the Kinetics of Opsin Synthesis. Journal of Neuroscience, 2000, 20, 2247-2254.	3.6	107
115	rax, Hes1, and notch1 Promote the Formation of MÃ¼ller Glia by Postnatal Retinal Progenitor Cells. Neuron, 2000, 26, 383-394.	8.1	482
116	Expression of Chx10 and Chx10-1 in the developing chicken retina. Mechanisms of Development, 2000, 90, 293-297.	1.7	95
117	Retinopathy and attenuated circadian entrainment in Crx-deficient mice. Nature Genetics, 1999, 23, 466-470.	21.4	476
118	Regulation of Chamber-Specific Gene Expression in the Developing Heart by Irx4. Science, 1999, 283, 1161-1164.	12.6	232
119	Misexpression of the Emx-Related Homeobox Genes cVax and mVax2 Ventralizes the Retina and Perturbs the Retinotectal Map. Neuron, 1999, 24, 541-553.	8.1	148
120	Production and Design of More Effective Avian Replication-Incompetent Retroviral Vectors. Developmental Biology, 1999, 214, 370-384.	2.0	54
121	Lineage Analysis Using Retroviral Vectors. Methods, 1998, 14, 393-406.	3.8	51
122	Two Phases of Rod Photoreceptor Differentiation during Rat Retinal Development. Journal of Neuroscience, 1998, 18, 3738-3748.	3.6	151
123	Crx, a Novel otx-like Homeobox Gene, Shows Photoreceptor-Specific Expression and Regulates Photoreceptor Differentiation. Cell, 1997, 91, 531-541.	28.9	822
124	Cone-Rod Dystrophy Due to Mutations in a Novel Photoreceptor-Specific Homeobox Gene (CRX) Essential for Maintenance of the Photoreceptor. Cell, 1997, 91, 543-553.	28.9	520
125	The Expression and Function of<i>Notch</i>Pathway Genes in the Developing Rat Eye. Journal of Neuroscience, 1997, 17, 1425-1434.	3.6	282
126	Retrovirus Infection of Cells In Vitro and In Vivo. Current Protocols in Molecular Biology, 1996, 36, Unit9.14.	2.9	10

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127	Overview of the Retrovirus Transduction System. Current Protocols in Molecular Biology, 1996, 36, Unit9.9.	2.9	16
128	Detection of Helper Virus in Retrovirus Stocks. Current Protocols in Molecular Biology, 1996, 36, Unit9.13.	2.9	1
129	Quantitative analysis of proliferation and cell cycle length during development of the rat retina. Developmental Dynamics, 1996, 205, 293-307.	1.8	187
130	Clonal Analysis in the Chicken Retina Reveals Tangential Dispersion of Clonally Related Cells. Developmental Biology, 1994, 166, 666-682.	2.0	111
131	The Stability of Endogenous Tyrosine Hydroxylase Protein in PCâ€12 Cells Differs from That Expressed in Mouse Fibroblasts by Gene Transfer. Journal of Neurochemistry, 1994, 62, 863-872.	3.9	21
132	Clonal dispersion in proliferative layers of developing cerebral cortex. Nature, 1993, 362, 632-635.	27.8	264
133	[56] Lineage analysis using retrovirus vectors. Methods in Enzymology, 1993, 225, 933-960.	1.0	69
134	Generation and migration of cells in the developing striatum. Neuron, 1992, 9, 15-26.	8.1	180
135	<i>Response</i> : The Dispersion of Neuronal Clones Across the Cerebral Cortex. Science, 1992, 258, 317-320.	12.6	5
136	Response : The Dispersion of Neuronal Clones Across the Cerebral Cortex. Science, 1992, 258, 317-320.	12.6	0
137	Establishment and characterization of multipotent neural cell lines using retrovirus vectorâ€mediated oncogene transfer. Journal of Neurobiology, 1990, 21, 356-375.	3.6	374
138	Lineage-independent determination of cell type in the embryonic mouse retina. Neuron, 1990, 4, 833-845.	8.1	647
139	A common progenitor for neurons and glia persists in rat retina late in development. Nature, 1987, 328, 131-136.	27.8	1,331
140	Quantitative analysis of proliferation and cell cycle length during development of the rat retina. , 0, .		3