

# Aaron Lun

## List of Publications by Year in descending order

Source: <https://exaly.com/author-pdf/4102319/publications.pdf>

Version: 2024-02-01

101  
papers

129,670  
citations

30047

54  
h-index

33869

99  
g-index

126  
all docs

126  
docs citations

126  
times ranked

152128  
citing authors

#	ARTICLE	IF	CITATIONS
1	<code>edgeR</code> : a Bioconductor package for differential expression analysis of digital gene expression data. <i>Bioinformatics</i> , 2010, 26, 139-140.	1.8	32,955
2	limma powers differential expression analyses for RNA-sequencing and microarray studies. <i>Nucleic Acids Research</i> , 2015, 43, e47-e47.	6.5	26,032
3	featureCounts: an efficient general purpose program for assigning sequence reads to genomic features. <i>Bioinformatics</i> , 2014, 30, 923-930.	1.8	16,839
4	Linear Models and Empirical Bayes Methods for Assessing Differential Expression in Microarray Experiments. <i>Statistical Applications in Genetics and Molecular Biology</i> , 2004, 3, 1-25.	0.2	9,992
5	Gene ontology analysis for RNA-seq: accounting for selection bias. <i>Genome Biology</i> , 2010, 11, R14.	13.9	5,824
6	voom: precision weights unlock linear model analysis tools for RNA-seq read counts. <i>Genome Biology</i> , 2014, 15, R29.	13.9	4,603
7	Differential expression analysis of multifactor RNA-Seq experiments with respect to biological variation. <i>Nucleic Acids Research</i> , 2012, 40, 4288-4297.	6.5	4,474
8	Orchestrating high-throughput genomic analysis with Bioconductor. <i>Nature Methods</i> , 2015, 12, 115-121.	9.0	3,070
9	The Subread aligner: fast, accurate and scalable read mapping by seed-and-vote. <i>Nucleic Acids Research</i> , 2013, 41, e108-e108.	6.5	2,389
10	Generation of a functional mammary gland from a single stem cell. <i>Nature</i> , 2006, 439, 84-88.	13.7	1,824
11	The R package Rsubread is easier, faster, cheaper and better for alignment and quantification of RNA sequencing reads. <i>Nucleic Acids Research</i> , 2019, 47, e47-e47.	6.5	1,744
12	Batch effects in single-cell RNA-sequencing data are corrected by matching mutual nearest neighbors. <i>Nature Biotechnology</i> , 2018, 36, 421-427.	9.4	1,595
13	Scater: pre-processing, quality control, normalization and visualization of single-cell RNA-seq data in R. <i>Bioinformatics</i> , 2017, 33, 1179-1186.	1.8	1,283
14	Use of within-array replicate spots for assessing differential expression in microarray experiments. <i>Bioinformatics</i> , 2005, 21, 2067-2075.	1.8	1,250
15	Count-based differential expression analysis of RNA sequencing data using R and Bioconductor. <i>Nature Protocols</i> , 2013, 8, 1765-1786.	5.5	1,124
16	Small-sample estimation of negative binomial dispersion, with applications to SAGE data. <i>Biostatistics</i> , 2007, 9, 321-332.	0.9	939
17	Pooling across cells to normalize single-cell RNA sequencing data with many zero counts. <i>Genome Biology</i> , 2016, 17, 75.	3.8	912
18	A step-by-step workflow for low-level analysis of single-cell RNA-seq data with Bioconductor. <i>F1000Research</i> , 2016, 5, 2122.	0.8	822

#	ARTICLE	IF	CITATIONS
19	Moderated statistical tests for assessing differences in tag abundance. <i>Bioinformatics</i> , 2007, 23, 2881-2887.	1.8	777
20	Robust hyperparameter estimation protects against hypervariable genes and improves power to detect differential expression. <i>Annals of Applied Statistics</i> , 2016, 10, 946-963.	0.5	764
21	A step-by-step workflow for low-level analysis of single-cell RNA-seq data. <i>F1000Research</i> , 2016, 5, 2122.	0.8	654
22	EmptyDrops: distinguishing cells from empty droplets in droplet-based single-cell RNA sequencing data. <i>Genome Biology</i> , 2019, 20, 63.	3.8	608
23	Testing significance relative to a fold-change threshold is a TREAT. <i>Bioinformatics</i> , 2009, 25, 765-771.	1.8	570
24	From reads to genes to pathways: differential expression analysis of RNA-Seq experiments using Rsubread and the edgeR quasi-likelihood pipeline. <i>F1000Research</i> , 2016, 5, 1438.	0.8	497
25	Orchestrating single-cell analysis with Bioconductor. <i>Nature Methods</i> , 2020, 17, 137-145.	9.0	488
26	ROAST: rotation gene set tests for complex microarray experiments. <i>Bioinformatics</i> , 2010, 26, 2176-2182.	1.8	463
27	Permutation P-values Should Never Be Zero: Calculating Exact P-values When Permutations Are Randomly Drawn. <i>Statistical Applications in Genetics and Molecular Biology</i> , 2010, 9, Article39.	0.2	413
28	From reads to genes to pathways: differential expression analysis of RNA-Seq experiments using Rsubread and the edgeR quasi-likelihood pipeline. <i>F1000Research</i> , 2016, 5, 1438.	0.8	399
29	Transcriptome analyses of mouse and human mammary cell subpopulations reveal multiple conserved genes and pathways. <i>Breast Cancer Research</i> , 2010, 12, R21.	2.2	354
30	Itâ€™s DE-licious: A Recipe for Differential Expression Analyses of RNA-seq Experiments Using Quasi-Likelihood Methods in edgeR. <i>Methods in Molecular Biology</i> , 2016, 1418, 391-416.	0.4	352
31	The transcription factor IRF4 is essential for TCR affinity-mediated metabolic programming and clonal expansion of T cells. <i>Nature Immunology</i> , 2013, 14, 1155-1165.	7.0	337
32	csaw: a Bioconductor package for differential binding analysis of ChIP-seq data using sliding windows. <i>Nucleic Acids Research</i> , 2016, 44, e45-e45.	6.5	325
33	Three-dimensional disorganization of the cancer genome occurs coincident with long-range genetic and epigenetic alterations. <i>Genome Research</i> , 2016, 26, 719-731.	2.4	312
34	Detecting Differential Expression in RNA-sequence Data Using Quasi-likelihood with Shrunken Dispersion Estimates. <i>Statistical Applications in Genetics and Molecular Biology</i> , 2012, 11, .	0.2	282
35	RANK ligand as a potential target for breast cancer prevention in BRCA1-mutation carriers. <i>Nature Medicine</i> , 2016, 22, 933-939.	15.2	224
36	Series evaluation of Tweedie exponential dispersion model densities. <i>Statistics and Computing</i> , 2005, 15, 267-280.	0.8	220

#	ARTICLE	IF	CITATIONS
37	Detection and removal of barcode swapping in single-cell RNA-seq data. <i>Nature Communications</i> , 2018, 9, 2667.	5.8	208
38	diffHic: a Bioconductor package to detect differential genomic interactions in Hi-C data. <i>BMC Bioinformatics</i> , 2015, 16, 258.	1.2	198
39	A single-cell RNA expression atlas of normal, preneoplastic and tumorigenic states in the human breast. <i>EMBO Journal</i> , 2021, 40, e107333.	3.5	170
40	Fitting Tweedie's Compound Poisson Model to Insurance Claims Data: Dispersion Modelling. <i>ASTIN Bulletin</i> , 2002, 32, 143-157.	0.7	152
41	Construction of developmental lineage relationships in the mouse mammary gland by single-cell RNA profiling. <i>Nature Communications</i> , 2017, 8, 1627.	5.8	151
42	Synergistic action of the MCL-1 inhibitor S63845 with current therapies in preclinical models of triple-negative and HER2-amplified breast cancer. <i>Science Translational Medicine</i> , 2017, 9, .	5.8	148
43	Testing for differential abundance in mass cytometry data. <i>Nature Methods</i> , 2017, 14, 707-709.	9.0	144
44	COMRADES determines in vivo RNA structures and interactions. <i>Nature Methods</i> , 2018, 15, 785-788.	9.0	143
45	The neuropeptide VIP confers anticipatory mucosal immunity by regulating ILC3 activity. <i>Nature Immunology</i> , 2020, 21, 168-177.	7.0	133
46	Overcoming confounding plate effects in differential expression analyses of single-cell RNA-seq data. <i>Biostatistics</i> , 2017, 18, 451-464.	0.9	121
47	Differential Expression Analysis of Complex RNA-seq Experiments Using edgeR. , 2014, , 51-74.		119
48	Global Changes in the Mammary Epigenome Are Induced by Hormonal Cues and Coordinated by Ezh2. <i>Cell Reports</i> , 2013, 3, 411-426.	2.9	117
49	Specificity of RNAi, LNA and CRISPRi as loss-of-function methods in transcriptional analysis. <i>Nucleic Acids Research</i> , 2018, 46, 5950-5966.	6.5	101
50	Gata-3 Negatively Regulates the Tumor-Initiating Capacity of Mammary Luminal Progenitor Cells and Targets the Putative Tumor Suppressor Caspase-14. <i>Molecular and Cellular Biology</i> , 2011, 31, 4609-4622.	1.1	96
51	De novo detection of differentially bound regions for ChIP-seq data using peaks and windows: controlling error rates correctly. <i>Nucleic Acids Research</i> , 2014, 42, e95-e95.	6.5	96
52	Isolation and Comparative Transcriptome Analysis of Human Fetal and iPSC-Derived Cone Photoreceptor Cells. <i>Stem Cell Reports</i> , 2017, 9, 1898-1915.	2.3	90
53	Transcription-factor-mediated supervision of global genome architecture maintains B cell identity. <i>Nature Immunology</i> , 2018, 19, 1257-1264.	7.0	83
54	iSEE: Interactive SummarizedExperiment Explorer. <i>F1000Research</i> , 2018, 7, 741.	0.8	83

#	ARTICLE	IF	CITATIONS
55	T cell cytolytic capacity is independent of initial stimulation strength. <i>Nature Immunology</i> , 2018, 19, 849-858.	7.0	74
56	A non-Canonical function of Ezh2 preserves immune homeostasis. <i>EMBO Reports</i> , 2017, 18, 619-631.	2.0	73
57	Assessing the reliability of spike-in normalization for analyses of single-cell RNA sequencing data. <i>Genome Research</i> , 2017, 27, 1795-1806.	2.4	70
58	Differential methylation analysis of reduced representation bisulfite sequencing experiments using edgeR. <i>F1000Research</i> , 2017, 6, 2055.	0.8	70
59	EGF-mediated induction of Mcl-1 at the switch to lactation is essential for alveolar cell survival. <i>Nature Cell Biology</i> , 2015, 17, 365-375.	4.6	65
60	Transcription Factor PU.1 Promotes Conventional Dendritic Cell Identity and Function via Induction of Transcriptional Regulator DC-SCRIPT. <i>Immunity</i> , 2019, 50, 77-90.e5.	6.6	59
61	Targeting histone acetylation dynamics and oncogenic transcription by catalytic P300/CBP inhibition. <i>Molecular Cell</i> , 2021, 81, 2183-2200.e13.	4.5	59
62	The use of miRNA microarrays for the analysis of cancer samples with global miRNA decrease. <i>Rna</i> , 2013, 19, 876-888.	1.6	52
63	Differential methylation analysis of reduced representation bisulfite sequencing experiments using edgeR. <i>F1000Research</i> , 2017, 6, 2055.	0.8	52
64	RUNX2 Mediates Plasmacytoid Dendritic Cell Egress from the Bone Marrow and Controls Viral Immunity. <i>Cell Reports</i> , 2016, 15, 866-878.	2.9	50
65	Repression of <i>Igf1</i> expression by Ezh2 prevents basal cell differentiation in the developing lung. <i>Development (Cambridge)</i> , 2015, 142, 1458-69.	1.2	48
66	SpatialExperiment: infrastructure for spatially-resolved transcriptomics data in R using Bioconductor. <i>Bioinformatics</i> , 2022, 38, 3128-3131.	1.8	48
67	A high-content RNAi screen reveals multiple roles for long noncoding RNAs in cell division. <i>Nature Communications</i> , 2020, 11, 1851.	5.8	43
68	A critical epithelial survival axis regulated by MCL-1 maintains thymic function in mice. <i>Blood</i> , 2017, 130, 2504-2515.	0.6	40
69	Infrastructure for genomic interactions: Bioconductor classes for Hi-C, ChIA-PET and related experiments. <i>F1000Research</i> , 2016, 5, 950.	0.8	38
70	Locus-specific expression of transposable elements in single cells with CELLO-seq. <i>Nature Biotechnology</i> , 2022, 40, 546-554.	9.4	38
71	RNA-seq mixology: designing realistic control experiments to compare protocols and analysis methods. <i>Nucleic Acids Research</i> , 2017, 45, e30-e30.	6.5	34
72	Mammary tumour cells remodel the bone marrow vascular microenvironment to support metastasis. <i>Nature Communications</i> , 2021, 12, 6920.	5.8	32

#	ARTICLE	IF	CITATIONS
73	Calling differentially methylated regions from whole genome bisulphite sequencing with DMRcate. <i>Nucleic Acids Research</i> , 2021, 49, e109-e109.	6.5	31
74	Integration of microRNA signatures of distinct mammary epithelial cell types with their gene expression and epigenetic portraits. <i>Breast Cancer Research</i> , 2015, 17, 85.	2.2	29
75	An Erg-driven transcriptional program controls B cell lymphopoiesis. <i>Nature Communications</i> , 2020, 11, 3013.	5.8	29
76	Polycomb repressive complex 2 (PRC2) suppresses E $\mu$ -myc lymphoma. <i>Blood</i> , 2013, 122, 2654-2663.	0.6	26
77	Multi-level remodelling of chromatin underlying activation of human T cells. <i>Scientific Reports</i> , 2021, 11, 528.	1.6	26
78	Single cell transcriptome atlas of mouse mammary epithelial cells across development. <i>Breast Cancer Research</i> , 2021, 23, 69.	2.2	26
79	Acetylation of the Cd8 Locus by KAT6A Determines Memory T Cell Diversity. <i>Cell Reports</i> , 2016, 16, 3311-3321.	2.9	25
80	Mass Trees: A New Phylogenetic Approach and Algorithm to Chart Evolutionary History with Mass Spectrometry. <i>Analytical Chemistry</i> , 2013, 85, 5475-5482.	3.2	24
81	Foxp1 Is Indispensable for Ductal Morphogenesis and Controls the Exit of Mammary Stem Cells from Quiescence. <i>Developmental Cell</i> , 2018, 47, 629-644.e8.	3.1	24
82	Type 1 diabetes in pregnancy is associated with distinct changes in the composition and function of the gut microbiome. <i>Microbiome</i> , 2021, 9, 167.	4.9	23
83	Infrastructure for genomic interactions: Bioconductor classes for Hi-C, ChIA-PET and related experiments. <i>F1000Research</i> , 2016, 5, 950.	0.8	22
84	From reads to regions: a Bioconductor workflow to detect differential binding in ChIP-seq data. <i>F1000Research</i> , 2015, 4, 1080.	0.8	21
85	FluShuffle and FluResort: new algorithms to identify reassorted strains of the influenza virus by mass spectrometry. <i>BMC Bioinformatics</i> , 2012, 13, 208.	1.2	20
86	Genome-wide analysis reveals no evidence of trans chromosomal regulation of mammalian immune development. <i>PLoS Genetics</i> , 2018, 14, e1007431.	1.5	19
87	From reads to regions: a Bioconductor workflow to detect differential binding in ChIP-seq data. <i>F1000Research</i> , 2015, 4, 1080.	0.8	19
88	Pre-mitotic genome re-organisation bookends the B cell differentiation process. <i>Nature Communications</i> , 2021, 12, 1344.	5.8	18
89	Senescence-induced endothelial phenotypes underpin immune-mediated senescence surveillance. <i>Genes and Development</i> , 2022, 36, 533-549.	2.7	14
90	No counts, no variance: allowing for loss of degrees of freedom when assessing biological variability from RNA-seq data. <i>Statistical Applications in Genetics and Molecular Biology</i> , 2017, 16, 83-93.	0.2	13

#	ARTICLE	IF	CITATIONS
91	beachmat: A Bioconductor C++ API for accessing high-throughput biological data from a variety of R matrix types. <i>PLoS Computational Biology</i> , 2018, 14, e1006135.	1.5	12
92	Canonical PRC2 function is essential for mammary gland development and affects chromatin compaction in mammary organoids. <i>PLoS Biology</i> , 2018, 16, e2004986.	2.6	10
93	Identification and characterization of the long noncoding RNA Dreg1 as a novel regulator of Gata3. <i>Immunology and Cell Biology</i> , 2021, 99, 323-332.	1.0	9
94	Chromosomes distribute randomly to, but not within, human neutrophil nuclear lobes. <i>IScience</i> , 2021, 24, 102161.	1.9	8
95	<i>In vivo</i> genome editing screen identifies tumor suppressor genes that cooperate with <i>Trp53</i> loss during mammary tumorigenesis. <i>Molecular Oncology</i> , 2022, 16, 1119-1131.	2.1	6
96	Loss of TAF8 causes TFIID dysfunction and p53-mediated apoptotic neuronal cell death. <i>Cell Death and Differentiation</i> , 2022, 29, 1013-1027.	5.0	6
97	The histone acetyltransferase HBO1 promotes efficient tip cell sprouting during angiogenesis. <i>Development (Cambridge)</i> , 2021, 148, .	1.2	4
98	R code and downstream analysis objects for the scRNA-seq atlas of normal and tumorigenic human breast tissue. <i>Scientific Data</i> , 2022, 9, 96.	2.4	4
99	Differential requirement for the Polycomb repressor complex 2 in dendritic cell and tissue-resident myeloid cell homeostasis. <i>Science Immunology</i> , 2021, 6, eabf7268.	5.6	3
100	Transcriptome and H3K27 tri-methylation profiling of Ezh2-deficient lung epithelium. <i>Genomics Data</i> , 2015, 5, 346-351.	1.3	2
101	Multi-Level Chromosome Remodeling Underlying Activation of Human T Cells. <i>SSRN Electronic Journal</i> , 0, , .	0.4	0