Carlo C Maley

List of Publications by Year
in descending order

89 papers	11,219 citations	71102 41 h-index	56724 83 g-index
96 all docs	96 docs citations	96 times ranked	13700 citing authors

#	Article	IF	Citations
1	Anomaly Detection of Calcifications in Mammography Based on 11,000 Negative Cases. IEEE Transactions on Biomedical Engineering, 2022, 69, 1639-1650.	4.2	9
2	Prediction of Upstaging in Ductal Carcinoma in Situ Based on Mammographic Radiomic Features. Radiology, 2022, 303, 54-62.	7.3	17
3	Cancer risk across mammals. Nature, 2022, 601, 263-267.	27.8	86
4	The life history theory of the Lord of the Rings: a randomized controlled trial of using fact versus fiction to teach life history theory. Evolution: Education and Outreach, 2022, 15, 2.	0.8	1
5	Somatic whole genome dynamics of precancer in Barrettâ€™s esophagus reveals features associated with disease progression. Nature Communications, 2022, 13, 2300.	12.8	13
6	Diet, Microbes, and Cancer Across the Tree of Life: a Systematic Review. Current Nutrition Reports, 2022, 11, 508-525.	4.3	8
7	Identifying key questions in the ecology and evolution of cancer. Evolutionary Applications, 2021, 14, 877-892.	3.1	58
8	Elephant Genomes Reveal Accelerated Evolution in Mechanisms Underlying Disease Defenses. Molecular Biology and Evolution, 2021, 38, 3606-3620.	8.9	33
9	A new method to accurately identify single nucleotide variants using small FFPE breast samples. Briefings in Bioinformatics, 2021, 22, .	6.5	4
10	Upregulation of DNA repair genes and cell extrusion underpin the remarkable radiation resistance of Trichoplax adhaerens. PLoS Biology, 2021, 19, e3001471.	5.6	9
11	Prediction of Upstaged Ductal Carcinoma In Situ Using Forced Labeling and Domain Adaptation. IEEE Transactions on Biomedical Engineering, 2020, 67, 1565-1572.	4.2	19
12	Application of simultaneous selective pressures slows adaptation. Evolutionary Applications, 2020, 13, 1615-1625.	3.1	0
13	The evolution of metapopulation dynamics and the number of stem cells in intestinal crypts and other tissue structures in multicellular bodies. Evolutionary Applications, 2020, 13, 1771-1783.	3.1	3
14	The Evolution of Human Cancer Gene Duplications acrossÂMammals. Molecular Biology and Evolution, 2020, 37, 2875-2886.	8.9	31
15	Lifetime cancer prevalence and life history traits in mammals. Evolution, Medicine and Public Health, 2020, 2020, 187-195.	2.5	56
16	Minimal barriers to invasion during human colorectal tumor growth. Nature Communications, 2020, 11, 1280.	12.8	28
17	Mapping the breast cancer metastatic cascade onto ctDNA using genetic and epigenetic clonal tracking. Nature Communications, 2020, 11, 1446.	12.8	28
18	Barbara Natterson-Horowitz and Kathryn Bowers, Wildhood: The Epic Journey from Adolescence to Adulthood in Humans and Other Animals. Evolution, Medicine and Public Health, 2020, 2020, 158-160.	2.5	0

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19	Exploiting evolutionary steering to induce collateral drug sensitivity in cancer. Nature Communications, 2020, 11, 1923.	12.8	79
20	Return to the Sea, Get Huge, Beat Cancer: An Analysis of Cetacean Genomes Including an Assembly for the Humpback Whale (Megaptera novaeangliae). Molecular Biology and Evolution, 2019, 36, 1746-1763.	8.9	75
21	Analysis of tumour ecological balance reveals resource-dependent adaptive strategies of ovarian cancer. EBioMedicine, 2019, 48, 224-235.	6.1	8
22	Evolution of Barrettâ€™s esophagus through space and time at single-crypt and whole-biopsy levels. Nature Communications, 2018, 9, 794.	12.8	47
23	Prediction of Occult Invasive Disease in Ductal Carcinoma in Situ Using Deep Learning Features. Journal of the American College of Radiology, 2018, 15, 527-534.	1.8	56
24	Modeling the Subclonal Evolution of Cancer Cell Populations. Cancer Research, 2018, 78, 830-839.	0.9	37
25	The Spatiotemporal Evolution of Lymph Node Spread in Early Breast Cancer. Clinical Cancer Research, 2018, 24, 4763-4770.	7.0	30
26	Improving classification with forced labeling of other related classes: application to prediction of upstaged ductal carcinoma in situ using mammographic features. , 2018, , .		1
27	Genomic Instability in Cancer: Teetering on the Limit of Tolerance. Cancer Research, 2017, 77, 2179-2185.	0.9	182
28	Can Occult Invasive Disease in Ductal Carcinoma In Situ Be Predicted Using Computer-extracted Mammographic Features?. Academic Radiology, 2017, 24, 1139-1147.	2.5	18
29	Cooperation and cheating as innovation: insights from cellular societies. Philosophical Transactions of the Royal Society B: Biological Sciences, 2017, 372, 20160421.	4.0	12
30	Classifying the evolutionary and ecological features of neoplasms. Nature Reviews Cancer, 2017, 17, 605-619.	28.4	303
31	Natural Selection in Cancer Biology: From Molecular Snowflakes to Trait Hallmarks. Cold Spring Harbor Perspectives in Medicine, 2017, 7, a029652.	6.2	48
32	Petoâ€™s Paradox: how has evolution solved the problem of cancer prevention?. BMC Biology, 2017, 15, 60.	3.8	60
33	Dynamic clonal equilibrium and predetermined cancer risk in Barrettâ€™s oesophagus. Nature Communications, 2016, 7, 12158.	12.8	75
34	When (distant) relatives stay too long: implications for cancer medicine. Genome Biology, 2016, 17, 34.	8.8	2
35	Pan-cancer analysis of the extent and consequences of intratumor heterogeneity. Nature Medicine, 2016, 22, 105-113.	30.7	629
36	Derivation of genetic biomarkers for cancer risk stratification in Barrettâ€™s oesophagus: a prospective cohort study. Gut, 2016, 65, 1602-1610.	12.1	39

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37	Bulk Genotyping of Biopsies Can Create Spurious Evidence for Hetereogeneity in Mutation Content. PLoS Computational Biology, 2016, 12, e1004413.	3.2	21
38	The Evolutionary Foundations of Cancer Research. , 2016, , 1-16.		0
39	An ecological measure of immune-cancer colocalization as a prognostic factor for breast cancer. Breast Cancer Research, 2015, 17, 131.	5.0	81
40	Peto's paradox and the promise of comparative oncology. Philosophical Transactions of the Royal Society B: Biological Sciences, 2015, 370, 20140177.	4.0	58
41	Can oncology recapitulate paleontology? Lessons from species extinctions. Nature Reviews Clinical Oncology, 2015, 12, 273-285.	27.6	31
42	Cancer across the tree of life: cooperation and cheating in multicellularity. Philosophical Transactions of the Royal Society B: Biological Sciences, 2015, 370, 20140219.	4.0	303
43	Potential Mechanisms for Cancer Resistance in Elephants and Comparative Cellular Response to DNA Damage in Humans. JAMA - Journal of the American Medical Association, 2015, 314, 1850.	7.4	346
44	Solutions to Peto's paradox revealed by mathematical modelling and cross-species cancer gene analysis. Philosophical Transactions of the Royal Society B: Biological Sciences, 2015, 370, 20140222.	4.0	69
45	Assessment of Esophageal Adenocarcinoma Risk Using Somatic Chromosome Alterations in Longitudinal Samples in Barrett's Esophagus. Cancer Prevention Research, 2015, 8, 845-856.	1.5	44
46	Temporal and Spatial Evolution of Somatic Chromosomal Alterations: A Case-Cohort Study of Barrett's Esophagus. Cancer Prevention Research, 2014, 7, 114-127.	1.5	135
47	Is eating behavior manipulated by the gastrointestinal microbiota? Evolutionary pressures and potential mechanisms. BioEssays, 2014, 36, 940-949.	2.5	328
48	Life history trade-offs in cancer evolution. Nature Reviews Cancer, 2013, 13, 883-892.	28.4	207
49	Modelling the evolution of genetic instability during tumour progression. Evolutionary Applications, 2013, 6, 20-33.	3.1	41
50	An evolutionary explanation for the presence of cancer nonstem cells in neoplasms. Evolutionary Applications, 2013, 6, 92-101.	3.1	25
51	NSAIDs Modulate Clonal Evolution in Barrett's Esophagus. PLoS Genetics, 2013, 9, e1003553.	3.5	59
52	Dispersal Evolution in Neoplasms: The Role of Disregulated Metabolism in the Evolution of Cell Motility. Cancer Prevention Research, 2012, 5, 266-275.	1.5	38
53	Cancer in Light of Experimental Evolution. Current Biology, 2012, 22, R762-R771.	3.9	103
54	Natural resistance to cancers: a Darwinian hypothesis to explain Petoâ€™s paradox. BMC Cancer, 2012, 12, 387.	2.6	44

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55	Clonal evolution in cancer. Nature, 2012, 481, 306-313.	27.8	2,570
56	Spatial structure increases the waiting time for cancer. New Journal of Physics, 2011, 13, 115014.	2.9	77
57	Peto's Paradox: evolution's prescription for cancer prevention. Trends in Ecology and Evolution, 2011, 26, 175-182.	8.7	290
58	Solving the Puzzle of Metastasis: The Evolution of Cell Migration in Neoplasms. PLoS ONE, 2011, 6, e17933.	2.5	51
59	An in vitro co-culture model of esophageal cells identifies ascorbic acid as a modulator of cell competition. BMC Cancer, 2011, 11, 461.	2.6	16
60	New Strategies in Barrett's Esophagus: Integrating Clonal Evolutionary Theory with Clinical Management. Clinical Cancer Research, 2011, 17, 3512-3519.	7.0	30
61	Accurate Reconstruction of the Temporal Order of Mutations in Neoplastic Progression. Cancer Prevention Research, 2011, 4, 1135-1144.	1.5	54
62	Somatic Evolution in Neoplastic Progression and Cancer Prevention. , 2011, , 111-127.		6
63	Overlooking Evolution: A Systematic Analysis of Cancer Relapse and Therapeutic Resistance Research. PLoS ONE, 2011, 6, e26100.	2.5	88
64	New models of neoplastic progression in Barrett's oesophagus. Biochemical Society Transactions, 2010, 38, 331-336.	3.4	10
65	A Comprehensive Survey of Clonal Diversity Measures in Barrett's Esophagus as Biomarkers of Progression to Esophageal Adenocarcinoma. Cancer Prevention Research, 2010, 3, 1388-1397.	1.5	140
66	Deletion at Fragile Sites Is a Common and Early Event in Barrett's Esophagus. Molecular Cancer Research, 2010, 8, 1084-1094.	3.4	40
67	Polyploidy, Aneuploidy and the Evolution of Cancer. Advances in Experimental Medicine and Biology, 2010, 676, 1-13.	1.6	22
68	NCI First International Workshop on the Biology, Prevention, and Treatment of Relapse After Allogeneic Hematopoietic Stem Cell Transplantation: Report from the Committee on the Biological Considerations of Hematological Relapse following Allogeneic Stem Cell Transplantation Unrelated to Graft-versus-Tumor Effects: State of the Science. Biology of Blood and Marrow Transplantation, 2010, 16, 709-728.	2.0	34
69	Cooperation and Cancer. , 2010, , 471-485.		4
70	The role of genetic diversity in cancer. Journal of Clinical Investigation, 2010, 120, 401-403.	8.2	52
71	Chromosomal Instability and Copy Number Alterations in Barrett's Esophagus and Esophageal Adenocarcinoma. Clinical Cancer Research, 2009, 15, 3305-3314.	7.0	99
72	SYNTHESIS: Cancer research meets evolutionary biology. Evolutionary Applications, 2009, 2, 62-70.	3.1	83

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73	Single Nucleotide Polymorphismâ€“Based Genome-Wide Chromosome Copy Change, Loss of Heterozygosity, and Aneuploidy in Barrett's Esophagus Neoplastic Progression. Cancer Prevention Research, 2008, 1, 413-423.	1.5	70
74	Preneoplastic lesion growth driven by the death of adjacent normal stem cells. Proceedings of the National Academy of Sciences of the United States of America, 2008, 105, 15034-15039.	7.1	36
75	Extent of Low-Grade Dysplasia Is a Risk Factor for the Development of Esophageal Adenocarcinoma in Barrett's Esophagus. American Journal of Gastroenterology, 2007, 102, 483-493.	0.4	121
76	NSAIDs Modulate CDKN2A, TP53, and DNA Content Risk for Progression to Esophageal Adenocarcinoma. PLoS Medicine, 2007, 4, e67.	8.4	228
77	Animal Cell Differentiation Patterns Suppress Somatic Evolution. PLoS Computational Biology, 2007, 3, e250.	3.2	62
78	Open questions in oesophageal adenocarcinogenesis. Gut, 2007, 56, 897-898.	12.1	7
79	Multistage carcinogenesis in Barrett's esophagus. Cancer Letters, 2007, 245, 22-32.	7.2	46
80	Genetic Mechanisms of TP53 Loss of Heterozygosity in Barrett's Esophagus: Implications for Biomarker Validation. Cancer Epidemiology Biomarkers and Prevention, 2006, 15, 509-516.	2.5	37
81	Barrett's Esophagus and Its Progression to Adenocarcinoma. Journal of the National Comprehensive Cancer Network: JNCCN, 2006, 4, 367-374.	4.9	25
82	Genetic clonal diversity predicts progression to esophageal adenocarcinoma. Nature Genetics, 2006, 38, 468-473.	21.4	635
83	Cancer as an evolutionary and ecological process. Nature Reviews Cancer, 2006, 6, 924-935.	28.4	1,470
84	Progress in Chemoprevention Drug Development: The Promise of Molecular Biomarkers for Prevention of Intraepithelial Neoplasia and Cancerâ€”A Plan to Move Forward. Clinical Cancer Research, 2006, 12, 3661-3697.	7.0	263
85	Natural selection in neoplastic progression of Barrett's esophagus. Seminars in Cancer Biology, 2005, 15, 474-483.	9.6	49
86	The Combination of Genetic Instability and Clonal Expansion Predicts Progression to Esophageal Adenocarcinoma. Cancer Research, 2004, 64, 7629-7633.	0.9	180
87	Selectively Advantageous Mutations and Hitchhikers in Neoplasms. Cancer Research, 2004, 64, 3414-3427.	0.9	199
88	Cancer prevention strategies that address the evolutionary dynamics of neoplastic cells: simulating benign cell boosters and selection for chemosensitivity. Cancer Epidemiology Biomarkers and Prevention, 2004, 13, 1375-84.	2.5	41
89	Exploring the Relationship between Neutral and Selective Mutations in Cancer. Artificial Life, 2000, 6, 325-345.	1.3	34