A Tale of Genome Compartmentalization: The Evolution Fungi

Genome Biology and Evolution 8, 681-704 DOI: 10.1093/gbe/evw026

Citation Report

#	Article	IF	CITATIONS
1	A complete toolset for the study of Ustilago bromivora and Brachypodium sp. as a fungal-temperate grass pathosystem. ELife, 2016, 5, .	6.0	49
2	Life cycle specialization of filamentous pathogens — colonization and reproduction in plant tissues. Current Opinion in Microbiology, 2016, 32, 31-37.	5.1	21
3	Apoplastic fungal effectors in historic perspective; a personal view. New Phytologist, 2016, 212, 805-813.	7.3	32
4	The Evolution of Orphan Regions in Genomes of a Fungal Pathogen of Wheat. MBio, 2016, 7, .	4.1	132
5	Biology, dynamics, and applications of transposable elements in basidiomycete fungi. Applied Microbiology and Biotechnology, 2017, 101, 1337-1350.	3.6	35
6	Putative orthologs of Ustilago maydis effectors screened from the genome of sugarcane smut fungus - Sporisorium scitamineum. Australasian Plant Pathology, 2017, 46, 147-156.	1.0	10
7	Fusarium in the age of genomics. Tropical Plant Pathology, 2017, 42, 184-189.	1.5	8
8	Ustilago maydis effectors and their impact on virulence. Nature Reviews Microbiology, 2017, 15, 409-421.	28.6	188
9	InÂvitro secretomic analysis identifies putative pathogenicity-related proteins of Sporisorium scitamineum – The sugarcane smut fungus. Fungal Biology, 2017, 121, 199-211.	2.5	11
10	Evolution and genome architecture in fungal plant pathogens. Nature Reviews Microbiology, 2017, 15, 756-771.	28.6	378
11	Effector-Mediated Communication of Filamentous Plant Pathogens With Their Hosts. Advances in Botanical Research, 2017, , 161-185.	1.1	4
12	Small RNA sequencing reveals a role for sugarcane miRNAs and their targets in response to Sporisorium scitamineum infection. BMC Genomics, 2017, 18, 325.	2.8	34
13	Development of an efficient vector system for gene knock-out and near in-cis gene complementation in the sugarcane smut fungus. Scientific Reports, 2017, 7, 3113.	3.3	26
14	Using Population and Comparative Genomics to Understand the Genetic Basis of Effector-Driven Fungal Pathogen Evolution. Frontiers in Plant Science, 2017, 8, 119.	3.6	135
15	The Comparison of Expressed Candidate Secreted Proteins from Two Arbuscular Mycorrhizal Fungi Unravels Common and Specific Molecular Tools to Invade Different Host Plants. Frontiers in Plant Science, 2017, 8, 124.	3.6	100
16	Insights into Host Cell Modulation and Induction of New Cells by the Corn Smut Ustilago maydis. Frontiers in Plant Science, 2017, 8, 899.	3.6	15
17	Plant jasmonate ZIM domain genes: shedding light on structure and expression patterns of JAZ gene family in sugarcane. BMC Genomics, 2017, 18, 771.	2.8	35
18	Cut-and-Paste Transposons in Fungi with Diverse Lifestyles. Genome Biology and Evolution, 2017, 9, 3463-3477.	2.5	77

CITATION REPORT

#	Article	IF	CITATIONS
20	A Near-Complete Haplotype-Phased Genome of the Dikaryotic Wheat Stripe Rust Fungus <i>Puccinia striiformis</i> f. sp. <i>tritici</i> Reveals High Interhaplotype Diversity. MBio, 2018, 9, .	4.1	112
21	Fine-Scale Recombination Maps of Fungal Plant Pathogens Reveal Dynamic Recombination Landscapes and Intragenic Hotspots. Genetics, 2018, 208, 1209-1229.	2.9	61
22	The birth and death of effectors in rapidly evolving filamentous pathogen genomes. Current Opinion in Microbiology, 2018, 46, 34-42.	5.1	106
23	Positively Selected Effector Genes and Their Contribution to Virulence in the Smut Fungus Sporisorium reilianum. Genome Biology and Evolution, 2018, 10, 629-645.	2.5	48
24	How to make a tumour: cell type specific dissection of <i>Ustilago maydisâ€</i> induced tumour development in maize leaves. New Phytologist, 2018, 217, 1681-1695.	7.3	55
25	Species Tree Estimation Using ASTRAL: How Many Genes Are Enough?. IEEE/ACM Transactions on Computational Biology and Bioinformatics, 2018, 15, 1738-1747.	3.0	19
26	Comparative analyses of secreted proteins in plant pathogenic smut fungi and related basidiomycetes. Fungal Genetics and Biology, 2018, 112, 21-30.	2.1	86
27	Development of a Tandem Repeat-Based Polymerase Chain Displacement Reaction Method for Highly Sensitive Detection of â€~ <i>Candidatus</i> Liberibacter asiaticus'. Phytopathology, 2018, 108, 292-298.	2.2	9
28	The Genome Biology of Effector Gene Evolution in Filamentous Plant Pathogens. Annual Review of Phytopathology, 2018, 56, 21-40.	7.8	195
29	Identification and evaluation of PCR reference genes for host and pathogen in sugarcane-Sporisorium scitamineum interaction system. BMC Genomics, 2018, 19, 479.	2.8	14
30	Comparative Genomics of Smut Pathogens: Insights From Orphans and Positively Selected Genes Into Host Specialization. Frontiers in Microbiology, 2018, 9, 660.	3.5	33
31	Comparative Methods for Molecular Determination of Host-Specificity Factors in Plant-Pathogenic Fungi. International Journal of Molecular Sciences, 2018, 19, 863.	4.1	51
32	Comprehensive profiling of codon usage signatures and codon context variations in the genus Ustilago. World Journal of Microbiology and Biotechnology, 2019, 35, 118.	3.6	9
33	Molecular Interactions Between Smut Fungi and Their Host Plants. Annual Review of Phytopathology, 2019, 57, 411-430.	7.8	59
34	Transposable Elements Adaptive Role in Genome Plasticity, Pathogenicity and Evolution in Fungal Phytopathogens. International Journal of Molecular Sciences, 2019, 20, 3597.	4.1	50
35	Identification and Functional Analysis of the Pheromone Response Factor Gene of Sporisorium scitamineum. Frontiers in Microbiology, 2019, 10, 2115.	3.5	15
36	Smut infection of perennial hosts: the genome and the transcriptome of the Brassicaceae smut fungus <i>Thecaphora thlaspeos</i> reveal functionally conserved and novel effectors. New Phytologist, 2019, 222, 1474-1492.	7.3	11
37	A dynamic degradome landscape on miRNAs and their predicted targets in sugarcane caused by Sporisorium scitamineum stress. BMC Genomics, 2019, 20, 57.	2.8	13

#	Article	IF	CITATIONS
38	Comparative genomics of chytrid fungi reveal insights into the obligate biotrophic and pathogenic lifestyle of Synchytrium endobioticum. Scientific Reports, 2019, 9, 8672.	3.3	36
39	Mitotic Recombination and Rapid Genome Evolution in the Invasive Forest Pathogen <i>Phytophthora ramorum</i> . MBio, 2019, 10, .	4.1	50
40	The emergence of the multiâ€species NIP1 effector in <i>Rhynchosporium</i> was accompanied by high rates of gene duplications and losses. Environmental Microbiology, 2019, 21, 2677-2695.	3.8	19
41	A chromosomeâ€scale genome assembly reveals a highly dynamic effector repertoire of wheat powdery mildew. New Phytologist, 2019, 221, 2176-2189.	7.3	79
42	Target the core: durable plant resistance against filamentous plant pathogens through effector recognition. Pest Management Science, 2020, 76, 426-431.	3.4	33
43	The insertion of a mitochondrial selfish element into the nuclear genome and its consequences. Ecology and Evolution, 2020, 10, 11117-11132.	1.9	4
44	Leaping into the Unknown World of Sporisorium scitamineum Candidate Effectors. Journal of Fungi (Basel, Switzerland), 2020, 6, 339.	3.5	7
45	Genome evolution in fungal plant pathogens: looking beyond the two-speed genome model. Fungal Biology Reviews, 2020, 34, 136-143.	4.7	63
46	Factors Affecting the Synthesis of Cellobiose Lipids by Sporisorium scitamineum. Frontiers in Bioengineering and Biotechnology, 2020, 8, 555647.	4.1	15
47	Characterization of Two Satellite DNA Families in the Genome of the Oomycete Plant Pathogen Phytophthora parasitica. Frontiers in Genetics, 2020, 11, 557.	2.3	6
48	The functionally conserved effector Sta1 is a fungal cell wall protein required for virulence in <i>Ustilago maydis</i> . New Phytologist, 2020, 227, 185-199.	7.3	20
49	Smut fungal strategies for the successful infection. Microbial Pathogenesis, 2020, 142, 104039.	2.9	9
51	Whole-Genome Comparisons of Ergot Fungi Reveals the Divergence and Evolution of Species within the Genus <i>Claviceps</i> Are the Result of Varying Mechanisms Driving Genome Evolution and Host Range Expansion. Genome Biology and Evolution, 2021, 13, .	2.5	17
52	Physiological Basis of Smut Infectivity in the Early Stages of Sugar Cane Colonization. Journal of Fungi (Basel, Switzerland), 2021, 7, 44.	3.5	4
54	Population Genomics of the Maize Pathogen <i>Ustilago maydis</i> : Demographic History and Role of Virulence Clusters in Adaptation. Genome Biology and Evolution, 2021, 13, .	2.5	11
55	Comparative transcriptome profiling identifies maize line specificity of fungal effectors in the maize– <i>Ustilago maydis</i> interaction. Plant Journal, 2021, 106, 733-752.	5.7	12
56	A cell surface-exposed protein complex with an essential virulence function in Ustilago maydis. Nature Microbiology, 2021, 6, 722-730.	13.3	31
57	Comparative expression analysis of potential pathogenicity-associated genes of high- and low-virulent Sporisorium scitamineum isolates during interaction with sugarcane. 3 Biotech, 2021, 11, 353.	2.2	6

CITATION REPORT

#	Article	IF	CITATIONS
58	Transposable Elements Contribute to Genome Dynamics and Gene Expression Variation in the Fungal Plant Pathogen <i>Verticillium dahliae</i> . Genome Biology and Evolution, 2021, 13, .	2.5	26
60	The Pleiades are a cluster of fungal effectors that inhibit host defenses. PLoS Pathogens, 2021, 17, e1009641.	4.7	24
61	A Novel Core Effector Vp1 Promotes Fungal Colonization and Virulence of Ustilago maydis. Journal of Fungi (Basel, Switzerland), 2021, 7, 589.	3.5	7
62	Sugarcane Smut, Caused by <i>Sporisorium scitamineum</i> , a Major Disease of Sugarcane: A Contemporary Review. Phytopathology, 2021, 111, 1905-1917.	2.2	27
63	Genome-Wide Analysis of Nutrient Signaling Pathways Conserved in Arbuscular Mycorrhizal Fungi. Microorganisms, 2021, 9, 1557.	3.6	9
64	Population genomics of transposable element activation in the highly repressive genome of an agricultural pathogen. Microbial Genomics, 2021, 7, .	2.0	8
65	Comparative Genomic Analysis Reveals Genetic Variation and Adaptive Evolution in the Pathogenicity-Related Genes of Phytophthora capsici. Frontiers in Microbiology, 2021, 12, 694136.	3.5	4
66	A fungal member of the Arabidopsis thaliana phyllosphere antagonizes Albugo laibachii via a GH25 lysozyme. ELife, 2021, 10, .	6.0	28
77	Effectors with Different Gears: Divergence of Ustilago maydis Effector Genes Is Associated with Their Temporal Expression Pattern during Plant Infection. Journal of Fungi (Basel, Switzerland), 2021, 7, 16.	3.5	11
78	A unique chromatin profile defines adaptive genomic regions in a fungal plant pathogen. ELife, 2020, 9,	6.0	37
80	A sugarcane smut fungus effector simulates the host endogenous elicitor peptide to suppress plant immunity. New Phytologist, 2022, 233, 919-933.	7.3	21
82	G-protein-coupled Receptors in Fungi. Fungal Biology, 2020, , 37-126.	0.6	7
85	Molecular Discrimination of Opposite Mating Type Haploids of Sporisorium scitamineum and Establishing Their Dimorphic Transitions During Interaction with Sugarcane. Sugar Tech, 2022, 24, 1430-1440.	1.8	4
87	Genome Analysis of the Broad Host Range Necrotroph Nalanthamala psidii Highlights Genes Associated With Virulence. Frontiers in Plant Science, 2022, 13, 811152.	3.6	1
89	My Personal Journey from the Fascination for Phages to a Tumor-Inducing Fungal Pathogen of Corn. Annual Review of Microbiology, 2022, 76, .	7.3	0
90	Unraveling the hCoV-19 Informational Architecture. , 2021, 2021, 2392-2395.		0
91	Transposable Elements in the Genome of the Lichen-Forming Fungus Umbilicaria pustulata and Their Distribution in Different Climate Zones along Elevation. Biology, 2022, 11, 24.	2.8	2
109	A chromosome-scale genome assembly of the tomato pathogen Cladosporium fulvum reveals a compartmentalized genome architecture and the presence of a dispensable chromosome. Microbial Genomics, 2022, 8, .	2.0	10

CITATION REPORT

#	Article	IF	CITATIONS
110	Squalene Monooxygenase Gene SsCl80130 Regulates Sporisorium scitamineum Mating/Filamentation and Pathogenicity. Journal of Fungi (Basel, Switzerland), 2022, 8, 470.	3.5	1
111	Chromosomal rearrangements with stable repertoires of genes and transposable elements in an invasive forest-pathogenic fungus. , 0, 2, .		1
112	The Sporisorium reilianum Effector Vag2 Promotes Head Smut Disease via Suppression of Plant Defense Responses. Journal of Fungi (Basel, Switzerland), 2022, 8, 498.	3.5	1
113	The contribution of DNA repair pathways to genome editing and evolution in filamentous pathogens. FEMS Microbiology Reviews, 2022, 46, .	8.6	23
114	Kynurenine 3-monooxygenase Gene SsCI51640 is Required for Sporisorium scitamineum Mating/Filamentation by Regulating cAMP Pathway and Improving Sporidia Environmental Adaptability. Phytopathology, 0, , .	2.2	0
115	Integrative transcriptome analysis revealed the pathogenic molecular basis of Rhizoctonia solani AG-3 TB at three progressive stages of infection. Frontiers in Microbiology, 0, 13, .	3.5	5
116	Transcriptome analysis of sugarcane reveals differential switching of major defense signaling pathways in response to Sporisorium scitamineum isolates with varying virulent attributes. Frontiers in Plant Science, 0, 13, .	3.6	2
117	The Venturia inaequalis effector repertoire is dominated by expanded families with predicted structural similarity, but unrelated sequence, to avirulence proteins from other plant-pathogenic fungi. BMC Biology, 2022, 20, .	3.8	13
118	Genome Organization and Copy-Number Variation Reveal Clues to Virulence Evolution in Coccidioides posadasii. Journal of Fungi (Basel, Switzerland), 2022, 8, 1235.	3.5	0
119	Modulation of Host Immunity and Development by Ustilago maydis. , 2023, , 3-30.		0
120	Prediction of effector protein structures from fungal phytopathogens enables evolutionary analyses. Nature Microbiology, 2023, 8, 174-187.	13.3	47
122	Progress in pathogenesis research of <i>Ustilago maydis</i> , and the metabolites involved along with their biosynthesis. Molecular Plant Pathology, 2023, 24, 495-509.	4.2	6
124	Epigenetic regulation of nuclear processes in fungal plant pathogens. PLoS Pathogens, 2023, 19, e1011525.	4.7	4
125	Segmental duplications drive the evolution of accessory regions in a major crop pathogen. New Phytologist, 2024, 242, 610-625.	7.3	0