

Genome Biology Department

Publications 2020-2023

2023

Abd Al-Razaq MA, Freyter BM, Isermann A, Tewary G, Mangelinck A, Mann C, Rübe CE. 2023. Role of Histone Variant H2A.J in Fine-Tuning Chromatin Organization for the Establishment of Ionizing Radiation-Induced Senescence. *Cells* **12**:916. doi:[10.3390/cells12060916](https://doi.org/10.3390/cells12060916)

Abdelli M, Falaise C, Morineaux-Hilaire V, Cumont A, Taysse L, Raynaud F, Ramisse V. 2023. Get to Know Your Neighbors: Characterization of Close *Bacillus anthracis* Isolates and Toxin Profile Diversity in the *Bacillus cereus* Group. *Microorganisms* **11**:2721. doi:[10.3390/microorganisms11112721](https://doi.org/10.3390/microorganisms11112721)

André KM, Giordanengo Aiach N, Martinez-Fernandez V, Zeitler L, Alberti A, Goldar A, Werner M, Denby Wilkes C, Soutourina J. 2023. Functional interplay between Mediator and RSC chromatin remodeling complex controls nucleosome-depleted region maintenance at promoters. *Cell Rep* **42**:112465. doi:[10.1016/j.celrep.2023.112465](https://doi.org/10.1016/j.celrep.2023.112465)

Arbona J-M, Kabalane H, Barbier J, Goldar A, Hyrien O, Audit B. 2023. Neural network and kinetic modelling of human genome replication reveal replication origin locations and strengths. *PLoS Comput Biol* **19**:e1011138. doi:[10.1371/journal.pcbi.1011138](https://doi.org/10.1371/journal.pcbi.1011138)

Arnesen T, Aksnes H, Giglione C. 2023. Protein Termini 2022: central roles of protein ends. *Trends Biochem Sci* **S0968-0004(23)00075–0**. doi:[10.1016/j.tibs.2023.02.008](https://doi.org/10.1016/j.tibs.2023.02.008)

Arnould C, Rocher V, Saur F, Bader AS, Muzzopappa F, Collins S, Lesage E, Le Bozec B, Puget N, Clouaire T, Mangeat T, Mourad R, Ahituv N, Noordermeer D, Erdel F, Bushell M, Marnef A, Legube G. 2023a. Author Correction: Chromatin compartmentalization regulates the response to DNA damage. *Nature*. doi:[10.1038/s41586-023-06841-8](https://doi.org/10.1038/s41586-023-06841-8)

Arnould C, Rocher V, Saur F, Bader AS, Muzzopappa F, Collins S, Lesage E, Le Bozec B, Puget N, Clouaire T, Mangeat T, Mourad R, Ahituv N, Noordermeer D, Erdel F, Bushell M, Marnef A, Legube G. 2023b. Chromatin compartmentalization regulates the response to DNA damage. *Nature*. doi:[10.1038/s41586-023-06635-y](https://doi.org/10.1038/s41586-023-06635-y)

Balbontín R, Figueroa-Bossi N, Bossi L. 2023a. Construction of Single-Copy Fluorescent Protein Fusions by One-Step Recombineering. *Cold Spring Harb Protoc*. doi:[10.1101/pdb.prot107950](https://doi.org/10.1101/pdb.prot107950)

Balbontín R, Ratel M, Figueroa-Bossi N, Bossi L. 2023b. Converting an FRT-Tagged Gene into a Fluorescent Protein Gene Fusion by Flp-Mediated Site-Specific Recombination. *Cold Spring Harb Protoc*. doi:[10.1101/pdb.prot107951](https://doi.org/10.1101/pdb.prot107951)

Barone M, Ramayo-Caldas Y, Estellé J, Tambosco K, Chadi S, Maillard F, Gallopin M, Planchais J, Chain F, Kropp C, Rios-Covian D, Sokol H, Brigidi P, Langella P, Martín R. 2023. Gut barrier-microbiota imbalances in early life lead to higher sensitivity to inflammation in a murine model of C-section delivery. *Microbiome* **11**:140. doi:[10.1186/s40168-023-01584-0](https://doi.org/10.1186/s40168-023-01584-0)

Bazin-Gélis M, Eleftheriou E, Zangarelli C, Lelandais G, Sperling L, Arnaiz O, Bétermier M. 2023. Inter-generational nuclear crosstalk links the control of gene expression to programmed genome rearrangement during the Paramecium sexual cycle. *Nucleic Acids Res* gkad1006. doi:[10.1093/nar/gkad1006](https://doi.org/10.1093/nar/gkad1006)

Belser C, Poulain J, Labadie K, Gavory F, Alberti A, Guy J, Carradec Q, Cruaud C, Da Silva C, Engelen S, Mielle P, Perdereau A, Samson G, Gas S, Genoscope Technical Team, Voolstra CR, Galand PE, Flores

JM, Hume BCC, Perna G, Ziegler M, Ruscheweyh H-J, Boissin E, Romac S, Bourdin G, Iwankow G, Moulin C, Paz García DA, Agostini S, Banaigs B, Boss E, Bowler C, de Vargas C, Douville E, Forcioli D, Furla P, Gilson E, Lombard F, Pesant S, Reynaud S, Sunagawa S, Thomas OP, Troublé R, Thurber RV, Zoccola D, Scarpelli C, Jacoby EK, Oliveira PH, Aury J-M, Allemand D, Planes S, Wincker P. 2023. Integrative omics framework for characterization of coral reef ecosystems from the Tara Pacific expedition. *Sci Data* **10**:326. doi:[10.1038/s41597-023-02204-0](https://doi.org/10.1038/s41597-023-02204-0)

Bétermier M, Klobutcher LA, Orias E. 2023. Programmed chromosome fragmentation in ciliated protozoa: multiple means to chromosome ends. *Microbiol Mol Biol Rev* e0018422. doi:[10.1128/mmbr.00184-22](https://doi.org/10.1128/mmbr.00184-22)

Bonaud A, Larraufie P, Khamyath M, Szachnowski U, Flint SM, Brunel-Meunier N, Delhommeau F, Munier A, Lönnberg T, Toffano-Nioche C, Gautheret D, Balabanian K, Espéli M. 2023. Transinteractome analysis reveals distinct niche requirements for isotype-based plasma cell subsets in the bone marrow. *Eur J Immunol* e2250334. doi:[10.1002/eji.202250334](https://doi.org/10.1002/eji.202250334)

Braetz S, Schwerk P, Figueroa-Bossi N, Tedin K, Fulde M. 2023. Prophage Gifsy-1 Induction in *Salmonella enterica* Serovar Typhimurium Reduces Persister Cell Formation after Ciprofloxacin Exposure. *Microbiol Spectr* e0187423. doi:[10.1128/spectrum.01874-23](https://doi.org/10.1128/spectrum.01874-23)

Bury-Moné S, Thibessard A, Liou VS, Leblond P. 2023. Dynamics of the Streptomyces chromosome: chance and necessity. *Trends Genet* S0168-9525(23)00166-X. doi:[10.1016/j.tig.2023.07.008](https://doi.org/10.1016/j.tig.2023.07.008)

Camus A, Espinosa E, Zapater Baras P, Singh P, Quenech'Du N, Vickridge E, Modesti M, Barre FX, Espéli O. 2023. The SMC-like RecN protein is at the crossroads of several genotoxic stress responses in *Escherichia coli*. *Front Microbiol* **14**:1146496. doi:[10.3389/fmicb.2023.1146496](https://doi.org/10.3389/fmicb.2023.1146496)

Challal D, Menant A, Goksal C, Leroy E, Al-Sady B, Rougemaille M. 2023. A dual, catalytic role for the fission yeast Ccr4-Not complex in gene silencing and heterochromatin spreading. *Genetics* iyad108. doi:[10.1093/genetics/iyad108](https://doi.org/10.1093/genetics/iyad108)

Clerissi C, Luo X, Lucasson A, Mortaza S, de Lorgeril J, Toulza E, Petton B, Escoubas J-M, Déremont L, Gueguen Y, Destoumieux-Garzón D, Jacq A, Mitta G. 2023. A core of functional complementary bacteria infects oysters in Pacific Oyster Mortality Syndrome. *Anim Microbiome* **5**:26. doi:[10.1186/s42523-023-00246-8](https://doi.org/10.1186/s42523-023-00246-8)

da Costa-Nunes JA, Noordermeer D. 2023. TADs: Dynamic structures to create stable regulatory functions. *Curr Opin Struct Biol* **81**:102622. doi:[10.1016/j.sbi.2023.102622](https://doi.org/10.1016/j.sbi.2023.102622)

Etherington RD, Bailey M, Boyer J-B, Armbruster L, Cao X, Coates JC, Meinnel T, Wirtz M, Giglione C, Gibbs DJ. 2023. Nt-acetylation-independent turnover of SQUALENE EPOXIDASE 1 by *Arabidopsis* DOA10-like E3 ligases. *Plant Physiol* kiad406. doi:[10.1093/plphys/kiad406](https://doi.org/10.1093/plphys/kiad406)

Figueroa-Bossi N, Balbontín R, Bossi L. 2023a. DNA Recombineering Applications. *Cold Spring Harb Protoc*. doi:[10.1101/pdb.top107855](https://doi.org/10.1101/pdb.top107855)

Figueroa-Bossi N, Balbontín R, Bossi L. 2023b. Generating Libraries of Random lacZY or GFP Gene Fusions in the Bacterial Chromosome: Screening for Differentially Expressed Fusions. *Cold Spring Harb Protoc*. doi:[10.1101/pdb.prot108196](https://doi.org/10.1101/pdb.prot108196)

Figueroa-Bossi N, Balbontín R, Bossi L. 2023c. Mapping Transposon Insertion Sites by Inverse Polymerase Chain Reaction and Sanger Sequencing. *Cold Spring Harb Protoc*. doi:[10.1101/pdb.prot108197](https://doi.org/10.1101/pdb.prot108197)

Figueroa-Bossi N, Balbontín R, Bossi L. 2023d. Recombineering 101: Making an in-Frame Deletion Mutant. *Cold Spring Harb Protoc*. doi:[10.1101/pdb.prot107856](https://doi.org/10.1101/pdb.prot107856)

Figueroa-Bossi N, Balbontín R, Bossi L. 2023e. Scarless DNA Recombineering. *Cold Spring Harb Protoc*. doi:[10.1101/pdb.prot107857](https://doi.org/10.1101/pdb.prot107857)

Figueroa-Bossi N, Balbontín R, Bossi L. 2023f. Use of Transposable Reporters in the Analysis of Bacterial Regulatory Networks. *Cold Spring Harb Protoc*. doi:[10.1101/pdb.top108327](https://doi.org/10.1101/pdb.top108327)

Girard C, Zwicker D, Mercier R. 2023. The regulation of meiotic crossover distribution: a coarse solution to a century-old mystery? *Biochem Soc Trans BST20221329*. doi:[10.1042/BST20221329](https://doi.org/10.1042/BST20221329)

Goudin A, Ferat J-L, Possoz C, Barre F-X, Galli E. 2023. Recovery of *Vibrio cholerae* polarized cellular organization after exit from a non-proliferating spheroplast state. *PLoS One* **18**:e0293276. doi:[10.1371/journal.pone.0293276](https://doi.org/10.1371/journal.pone.0293276)

Gout J-F, Hao Y, Johri P, Arnaiz O, Doak TG, Bhullar S, Couloux A, Guérin F, Malinsky S, Potekhin A, Sawka N, Sperling L, Labadie K, Meyer E, Duharcourt S, Lynch M. 2023. Dynamics of gene loss following ancient whole-genome duplication in the cryptic Paramecium complex. *Mol Biol Evol msad107*. doi:[10.1093/molbev/msad107](https://doi.org/10.1093/molbev/msad107)

Haccard O, Ciardo D, Narrissamprakash H, Bronchain O, Kumagai A, Dunphy WG, Goldar A, Marheineke K. 2023. Rif1 restrains the rate of replication origin firing in *Xenopus laevis*. *Commun Biol* **6**:788. doi:[10.1038/s42003-023-05172-8](https://doi.org/10.1038/s42003-023-05172-8)

Hensen N, Bonometti L, Westerberg I, Onut Bränström I, Guillou S, Cros-Aarteil S, Calhoun S, Haridas S, Kuo A, Mondo S, Pangilinan J, Riley R, LaButti K, Andreopoulos B, Lipzen A, Chen C, Yan M, Daum C, Ng V, Clum A, Steindorff A, Ohm RA, Martin F, Silar P, Natvig DO, Lalanne C, Gautier V, Lorena Ament-Velásquez S, Kruys Å, Hutchinson MI, Jo Powell A, Barry K, Miller AN, Grigoriev IV, Debuchy R, Gladieux P, Hiltunen Thorén M, Johannesson H. 2023. Genome-scale phylogeny and comparative genomics of the fungal order Sordariales. *Mol Phylogenet Evol* 107938. doi:[10.1016/j.ympev.2023.107938](https://doi.org/10.1016/j.ympev.2023.107938)

L M-P, B M, L M, J E, Y J, P G-H, C H, S B, D N. 2023. The *Drosophila* Fab-7 boundary modulates Abd-B gene activity by guiding an inversion of collinear chromatin organization and alternate promoter use. *Cell reports* **42**. doi:[10.1016/j.celrep.2022.111967](https://doi.org/10.1016/j.celrep.2022.111967)

Lo Y-C, Bruxaux J, Rodríguez de la Vega RC, O'Donnell S, Snirc A, Coton M, Le Piver M, Le Prieur S, Roueyre D, Dupont J, Houbraken J, Debuchy R, Ropars J, Giraud T, Branca A. 2023. Domestication in dry-cured meat *Penicillium* fungi: Convergent specific phenotypes and horizontal gene transfers without strong genetic subdivision. *Evol Appl* **16**:1637–1660. doi:[10.1111/eva.13591](https://doi.org/10.1111/eva.13591)

Meinnel T, Boyer J-B, Giglione C. 2023. The Global Acetylation Profiling Pipeline for Quick Assessment of Protein N-Acetyltransferase Specificity In Cellulo. *Methods Mol Biol* **2718**:137–150. doi:[10.1007/978-1-0716-3457-8_8](https://doi.org/10.1007/978-1-0716-3457-8_8)

Monassa P, Rivière F, Dian C, Frottin F, Giglione C, Meinnel T. 2023. Biochemical and structural analysis of N-myristoyltransferase mediated protein tagging. *Methods Enzymol* **684**:135–166. doi:[10.1016/bs.mie.2023.02.016](https://doi.org/10.1016/bs.mie.2023.02.016)

Nguyen PQ, Huecas S, Asif-Ladin A, Plaza-Pegueroles A, Capuzzi B, Palmic N, Conesa C, Acker J, Reguera J, Lesage P, Fernández-Tornero C. 2023. Structural basis of Ty1 integrase tethering to RNA polymerase III for targeted retrotransposon integration. *Nat Commun* **14**:1729. doi:[10.1038/s41467-023-37109-4](https://doi.org/10.1038/s41467-023-37109-4)

Noordermeer D. 2023. RNA Pol II enters the ring of cohesin-mediated loop extrusion. *Nat Genet*. doi:[10.1038/s41588-023-01463-2](https://doi.org/10.1038/s41588-023-01463-2)

Oliveira L, Chevrollier N, Dallery J-F, O'Connell RJ, Lebrun M-H, Viaud M, Lespinet O. 2023. CusProSe: a customizable protein annotation software with an application to the prediction of fungal secondary metabolism genes. *Sci Rep* **13**:1417. doi:[10.1038/s41598-023-27813-y](https://doi.org/10.1038/s41598-023-27813-y)

Penzo A, Dubarry M, Brocas C, Zheng M, Mangione RM, Rougemaille M, Goncalves C, Lautier O, Libri D, Simon M-N, Gély V, Dubrana K, Palancade B. 2023. A R-loop sensing pathway mediates the relocation

of transcribed genes to nuclear pore complexes. *Nat Commun* **14**:5606. doi:[10.1038/s41467-023-41345-z](https://doi.org/10.1038/s41467-023-41345-z)

Poinsignon T, Gallopin M, Grognat P, Malagnac F, Lelandais G, Poulain P. 2023. 3D models of fungal chromosomes to enhance visual integration of omics data. *NAR Genom Bioinform* **5**:lqad104. doi:[10.1093/nargab/lqad104](https://doi.org/10.1093/nargab/lqad104)

Pourcel C, Ouldali M, Tavares P, Essoh C. 2023. The saclayvirus Aci01-1 very long and complex fiber and its receptor at the *Acinetobacter baumannii* surface. *Arch Virol* **168**:187. doi:[10.1007/s00705-023-05817-3](https://doi.org/10.1007/s00705-023-05817-3)

Pradat Y, Viot J, Yurchenko AA, Gunbin K, Cerbone L, Deloger M, Grisay G, Verlingue L, Scott V, Padoleau I, Panunzi L, Michiels S, Hollebecque A, Jules-Clément G, Mezquita L, Lainé A, Loriot Y, Besse B, Friboulet L, André F, Cournède P-H, Gautheret D, Nikolaev SI. 2023. Integrative Pan-Cancer Genomic and Transcriptomic Analyses of Refractory Metastatic Cancer. *Cancer Discov* **13**:1116–1143. doi:[10.1158/2159-8290.CD-22-0966](https://doi.org/10.1158/2159-8290.CD-22-0966)

Rivière F, Monassa P, Giglione C, Meinnel T. 2023. Kinetic and catalytic features of N-myristoyltransferases. *Methods Enzymol* **684**:167–190. doi:[10.1016/bs.mie.2023.02.018](https://doi.org/10.1016/bs.mie.2023.02.018)

Rollo F, Martins GD, Gouveia AG, Ithurbide S, Servant P, Romão CV, Moe E. 2023. Insights into the role of three Endonuclease III enzymes for oxidative stress resistance in the extremely radiation resistant bacterium *Deinococcus radiodurans*. *Front Microbiol* **14**:1266785. doi:[10.3389/fmicb.2023.1266785](https://doi.org/10.3389/fmicb.2023.1266785)

Shen M, Goldlust K, Daniel S, Lesterlin C, Yamaichi Y. 2023. Recipient UvrD helicase is involved in single-to double-stranded DNA conversion during conjugative plasmid transfer. *Nucleic Acids Res* gkad075. doi:[10.1093/nar/gkad075](https://doi.org/10.1093/nar/gkad075)

Shevtsov A, Cloeckaert A, Berdimuratova K, Shevtsova E, Shustov AV, Amirkazin A, Karibayev T, Kamalova D, Zygmunt MS, Ramanculov Y, Vergnaud G. 2023. *Brucella abortus* in Kazakhstan, population structure and comparison with worldwide genetic diversity. *Front Microbiol* **14**:1106994. doi:[10.3389/fmicb.2023.1106994](https://doi.org/10.3389/fmicb.2023.1106994)

Sun D, Sun X, Hu Y, Yamaichi Y. 2023. Editorial: Horizontal gene transfer mediated bacterial antibiotic resistance, volume II. *Front Microbiol* **14**:1221606. doi:[10.3389/fmicb.2023.1221606](https://doi.org/10.3389/fmicb.2023.1221606)

Tewary G, Freyter B, Abd Al-Razaq M, Auerbach H, Laschke MW, Kübelbeck T, Kolb A, Mangelinck A, Mann C, Kramer D, Rübe CE. 2023. Immunomodulatory effects of histone variant H2A.J in ionizing radiation dermatitis. *Int J Radiat Oncol Biol Phys* S0360-3016(23)07934–8. doi:[10.1016/j.ijrobp.2023.09.022](https://doi.org/10.1016/j.ijrobp.2023.09.022)

Timofeev V, Bakhteeva I, Khlopova K, Mironova R, Titareva G, Goncharova Y, Solomentsev V, Kravchenko T, Dyatlov I, Vergnaud G. 2023. New Research on the *Bacillus anthracis* Genetic Diversity in Siberia. *Pathogens* **12**:1257. doi:[10.3390/pathogens12101257](https://doi.org/10.3390/pathogens12101257)

Vaitinadapoulé H, Poinard S, He Z, Pascale-Hamri A, Thomas J, Gain P, Thuret J-Y, Mascarelli F, Thuret G, French Fuchs Study Group (FFSG). 2023. Nanotopography by chromatic confocal microscopy of the endothelium in Fuchs endothelial corneal dystrophy, pseudophakic bullous keratopathy and healthy corneas. *Br J Ophthalmol* bjo-2023-323297. doi:[10.1136/bjo-2023-323297](https://doi.org/10.1136/bjo-2023-323297)

Vittorelli N, Rodríguez de la Vega RC, Snirc A, Levert E, Gautier V, Lalanne C, De Filippo E, Gladieux P, Guillou S, Zhang Y, Tejomurthula S, Grigoriev IV, Debuchy R, Silar P, Giraud T, Hartmann FE. 2023. Stepwise recombination suppression around the mating-type locus in an ascomycete fungus with self-fertile spores. *PLoS Genet* **19**:e1010347. doi:[10.1371/journal.pgen.1010347](https://doi.org/10.1371/journal.pgen.1010347)

Zickler D, Kleckner N. 2023. Meiosis: Dances Between Homologs. *Annu Rev Genet.* doi:[10.1146/annurev-genet-061323-044915](https://doi.org/10.1146/annurev-genet-061323-044915)

Adam, Yazid, Pierre Brezellec, Elena Espinosa, Amelie Besombes, Delphine Naquin, Evelyne Paly, Christophe Possoz, Erwin van Dijk, Barre Francois-Xavier, and Ferat Jean-Luc. 2022. "Plesiomonas Shigelloides, an Atypical Enterobacteriales with a Vibrio-Related Secondary Chromosome." *Genome Biology and Evolution*, January, evac011. <https://doi.org/10.1093/gbe/evac011>.

Barkova, Anastasia, Indranil Adhya, Christine Conesa, Amna Asif-Ladin, Amandine Bonnet, Elise Rabut, Carine Chagneau, Pascale Lesage, and Joël Acker. 2022. "A Proteomic Screen of Ty1 Integrase Partners Identifies the Protein Kinase CK2 as a Regulator of Ty1 Retrotransposition." *Mobile DNA* 13 (1): 26. <https://doi.org/10.1186/s13100-022-00284-0>.

Bastide, Paul, Charlotte Soneson, David B Stern, Olivier Lespinet, and Mélina Gallopin. 2022. "A Phylogenetic Framework to Simulate Synthetic Inter-Species RNA-Seq Data." *Molecular Biology and Evolution*, December, msac269. <https://doi.org/10.1093/molbev/msac269>.

Bidou, Laure, Olivier Bugaud, Goulven Merer, Matthieu Coupet, Isabelle Hatin, Egor Chirkin, Sabrina Karri, et al. 2022. "2-Guanidino-Quinazoline Promotes the Readthrough of Nonsense Mutations Underlying Human Genetic Diseases." *Proceedings of the National Academy of Sciences* 119 (35): e2122004119. <https://doi.org/10.1073/pnas.2122004119>.

Bokor, Eszter, Judit Ámon, Mónika Varga, András Szekeres, Zsófia Hegedűs, Tamás Jakusch, Zsolt Szakonyi, et al. 2022. "A Complete Nicotinate Degradation Pathway in the Microbial Eukaryote *Aspergillus nidulans*." *Communications Biology* 5 (1): 1–11. <https://doi.org/10.1038/s42003-022-03684-3>.

Coronel-Tellez, Rodrigo H, Mateusz Pospiech, Maxime Barrault, Wenfeng Liu, Valérie Bordeau, Christelle Vasnier, Brice Felden, Bruno Sargueil, and Philippe Bouloc. 2022. "SRNA-Controlled Iron Sparing Response in Staphylococci." *Nucleic Acids Research*, July, gkac648. <https://doi.org/10.1093/nar/gkac648>.

Costa, Maria. 2022. "Group II Introns: Flexibility and Repurposing." *Frontiers in Molecular Biosciences* 9 (June). <https://www.frontiersin.org/articles/10.3389/fmolb.2022.916157>.

Figueroa-Bossi, Nara, María Antonia Sánchez-Romero, Patricia Kerboriou, Delphine Naquin, Clara Mendes, Philippe Bouloc, Josep Casadesús, and Lionello Bossi. 2022. "Pervasive Transcription Enhances the Accessibility of H-NS–Silenced Promoters and Generates Bistability in *Salmonella* Virulence Gene Expression." *Proceedings of the National Academy of Sciences* 119 (30): e2203011119. <https://doi.org/10.1073/pnas.2203011119>.

Figueroa-Bossi, Nara, Roberto Balbontín, and Lionello Bossi. 2022. "Working with Phage P22." *Cold Spring Harbor Protocols*, August. <https://doi.org/10.1101/pdb.prot107850>.

Figueroa-Bossi, Nara, Roberto Balbontín, and Lionello Bossi. 2022. "Preparing Plasmid DNA from Bacteria." *Cold Spring Harbor Protocols*, August. <https://doi.org/10.1101/pdb.prot107852>.

Figueroa-Bossi, Nara, Roberto Balbontín, and Lionello Bossi. 2022. "Preparing Bacterial Genomic DNA." *Cold Spring Harbor Protocols*, August. <https://doi.org/10.1101/pdb.prot107853>.

Figueroa-Bossi, Nara, Roberto Balbontín, and Lionello Bossi. 2022. "Basic Bacteriological Routines." *Cold Spring Harbor Protocols*, August. <https://doi.org/10.1101/pdb.prot107849>.

Figueroa-Bossi, Nara, Roberto Balbontín, and Lionello Bossi. 2022. "Quick Transformation with Plasmid DNA." *Cold Spring Harbor Protocols*, August. <https://doi.org/10.1101/pdb.prot107854>.

Figueroa-Bossi, Nara, Roberto Balbontín, and Lionello Bossi. 2022. "Working with Bacteria, Phage, and Plasmids." *Cold Spring Harbor Protocols*, August. <https://doi.org/10.1101/pdb.top107848>.

Franck, Coste, Goffinont Stéphane, Cros Julien, Gaudon Virginie, Guérin Martine, Garnier Norbert, Fabrice Confalonieri, Flament Didier, Suskiewicz Marcin Josef, and Castaing Bertrand. 2022. "Structural and Functional Determinants of the Archaeal 8-Oxoguanine-DNA Glycosylase AGOG for DNA Damage Recognition and Processing." *Nucleic Acids Research*, October, gkac932. <https://doi.org/10.1093/nar/gkac932>.

"Gel-like Inclusions of C-Terminal Fragments of TDP-43 Sequester Stalled Proteasomes in Neurons." 2022. *EMBO Reports* n/a (n/a): e53890. <https://doi.org/10.15252/embr.202153890>.

Gianfrotta, Coline, Vladimir Reinhartz, Olivier Lespinet, Dominique Barth, and Alain Denise. 2022. "On the Predictability of A-Minor Motifs from Their Local Contexts." *RNA Biology* 19 (1): 1208–27. <https://doi.org/10.1080/15476286.2022.2144611>.

González-Alemán, Roy, Daniel Platero-Rochart, Alejandro Rodríguez-Serradet, Erix W Hernández-Rodríguez, Julio Caballero, Fabrice Leclerc, and Luis Montero-Cabrera. 2022. "MDSCAN: RMSD-Based HDBSCAN Clustering of Long Molecular Dynamics." *Bioinformatics*, October, btac666. <https://doi.org/10.1093/bioinformatics/btac666>.

Gosset, Simon, Annie Glatigny, Mélina Gallopin, Zhou Yi, Marion Salé, and Marie-Hélène Mucchielli-Giorgi. 2022. "APPINetwork: An R Package for Building and Computational Analysis of Protein-Protein Interaction Networks." *PeerJ* 10 (November): e14204. <https://doi.org/10.7717/peerj.14204>.

Grunchec, Héloïse, Jérôme Deraze, Delphine Dardalhon-Cuménal, Valérie Ribeiro, Anne Coléno-Costes, Karine Dias, Sébastien Bloyer, Emmanuelle Mouchel-Vielh, Frédérique Peronet, and Hélène Thomassin. 2022. "Single Amino-Acid Mutation in a Drosophila Melanogaster Ribosomal Protein: An Insight in UL11 Transcriptional Activity." *PLOS ONE* 17 (8): e0273198. <https://doi.org/10.1371/journal.pone.0273198>.

Guérin, Nina, Marta Ciccarella, Elisa Flamant, Paul Frémont, Sophie Mangenot, Benjamin Istace, Benjamin Noel, et al. 2022. "Genomic Adaptation of the Picoeukaryote Pelagomonas Calceolata to Iron-Poor Oceans Revealed by a Chromosome-Scale Genome Sequence." *Communications Biology* 5 (1): 1–14. <https://doi.org/10.1038/s42003-022-03939-z>.

L'Hôte, Valentin, Carl Mann, and Jean-Yves Thuret. 2022. "From the Divergence of Senescent Cell Fates to Mechanisms and Selectivity of Senolytic Drugs." *Open Biology* 12 (9): 220171. <https://doi.org/10.1098/rsob.220171>.

Lassagne, Alexandre, Sylvain Brun, Fabienne Malagnac, Henri Adreit, Joëlle Milazzo, Elisabeth Fournier, and Didier Tharreau. 2022. "Male Fertility in Pyricularia Oryzae: Microconidia Are Spermatia." *Environmental Microbiology* n/a (n/a). <https://doi.org/10.1111/1462-2920.16226>.

Lelandais, Gaëlle, Damien Remy, Fabienne Malagnac, and Pierre Grognat. 2022. "New Insights into Genome Annotation in Podospora Anserina through Re-Exploiting Multiple RNA-Seq Data." *BMC Genomics* 23 (1): 859. <https://doi.org/10.1186/s12864-022-09085-4>.

Lorenzi, Jean-Noël, Annabelle Thibessard, Virginia S Lioy, Frédéric Boccard, Pierre Leblond, Jean-Luc Pernodet, and Stéphanie Bury-Moné. 2022. "Ribosomal RNA Operons Define a Central Functional Compartment in the Streptomyces Chromosome." *Nucleic Acids Research*, November, gkac1076. <https://doi.org/10.1093/nar/gkac1076>.

Martín Caballero, Lucía, Matías Capella, Ramón Ramos Barrales, Nikolay Dobrev, Thomas van Emden, Yasuhiro Hirano, Vishnu N. Suma Sreechakram, et al. 2022. "The Inner Nuclear Membrane Protein Lem2 Coordinates RNA Degradation at the Nuclear Periphery." *Nature Structural & Molecular Biology* 29 (9): 910–21. <https://doi.org/10.1038/s41594-022-00831-6>.

Meléndez García, Rodrigo, Olivier Haccard, Albert Chesneau, Hemalatha Narassimprakash, Jérôme Roger, Muriel Perron, Kathrin Marheineke, and Odile Bronchain. 2022. "A Non-Transcriptional Function of Yap

Regulates the DNA Replication Program in *Xenopus Laevis*." Edited by Sigolène M Meilhac and Jessica K Tyler. *eLife* 11 (July): e75741. <https://doi.org/10.7554/eLife.75741>.

Miranda, Mélanie, Daan Noordermeer, and Benoit Moindrot. 2022. "Detection of Allele-Specific 3D Chromatin Interactions Using High-Resolution In-Nucleus 4C-Seq." In *Spatial Genome Organization: Methods and Protocols*, edited by Tom Sexton, 15–33. Methods in Molecular Biology. New York, NY: Springer US. https://doi.org/10.1007/978-1-0716-2497-5_2.

Moindrot, Benoit, and Daan Noordermeer. 2022. "Open for Connections: HiCAR Reveals the Interactions of Accessible DNA." *Cell Genomics* 2 (4): 100121. <https://doi.org/10.1016/j.xgen.2022.100121>.

Pranke, Iwona M., Jessica Varilh, Aurélie Hatton, Caroline Faucon, Emmanuelle Girodon, Elise Dreano, Benoit Chevalier, et al. 2022. "The U UGA C Sequence Provides a Favorable Context to ELX-02 Induced CFTR Readthrough." *Journal of Cystic Fibrosis* 0 (0). <https://doi.org/10.1016/j.jcf.2022.10.010>.

Pronier, Elodie, Aygun Imancı, Dorothée Selimoglu-Buet, Bouchra Badaoui, Raphael Itzykson, Thierry Roger, Chloé Jego, et al. 2022. "Macrophage Migration Inhibitory Factor Is Overproduced through EGR1 in TET2low Resting Monocytes." *Communications Biology* 5 (1): 110. <https://doi.org/10.1038/s42003-022-03057-w>.

Rivière, Frédéric, Cyril Dian, Rémi F. Dutheil, Paul Monassa, Carmela Giglione, and Thierry Meinnel. 2022. "Structural and Large-Scale Analysis Unveil the Intertwined Paths Promoting NMT-Catalyzed Lysine and Glycine Myristylation." *Journal of Molecular Biology*, September, 167843. <https://doi.org/10.1016/j.jmb.2022.167843>.

Robert, Caroline, and Daniel Gautheret. 2022. "Multi-Omics Prediction in Melanoma Immunotherapy: A New Brick in the Wall." *Cancer Cell* 40 (1): 14–16. <https://doi.org/10.1016/j.ccr.2021.12.008>.

Santos, Joana M., and Karine Frénal. 2022. "Dominique Soldati-Favre: Bringing Toxoplasma Gondii to the Molecular World." *Frontiers in Cellular and Infection Microbiology* 12 (May). <https://www.frontiersin.org/article/10.3389/fcimb.2022.910611>.

Segueni, Julie, and Daan Noordermeer. 2022. "CTCF: A Misguided Jack-of-All-Trades in Cancer Cells." *Computational and Structural Biotechnology Journal* 20 (January): 2685–98. <https://doi.org/10.1016/j.csbj.2022.05.044>.

Shevtsov, Alexandr, Zabida Aushakhmetova, Asylulan Amirkazin, Olga Khegay, Dinara Kamalova, Bibiaisha Sanakulova, Askar Abdaliyev, et al. 2022. "Whole Genome Sequence Analysis of Neisseria Meningitidis Strains Circulating in Kazakhstan, 2017–2018." *PLOS ONE* 17 (12): e0279536. <https://doi.org/10.1371/journal.pone.0279536>.

Timofeev, Vitalii, Irina Bakhteeva, Alexander Mokrievich, Galina Vakhrameeva, Elena Gritskova, Yuriy Anisimov, Evgeny Rozhdestvensky, et al. 2022. "The First Finding of Francisella Tularensis Subsp. Mediasiatica in Krasnoyarsk Territory, Siberia, and an Update of the Subspecies Genetic Diversity." *Bacteria* 1 (4): 242–49. <https://doi.org/10.3390/bacteria1040018>.

Uribe-Calvillo, Tannia, Laetitia Maestroni, Marie-Claude Marsolier, Basheer Khadaroo, Christine Arbiol, Jonathan Schott, and Bertrand Llorente. 2022. "Comprehensive Analysis of Cis- and Trans-Acting Factors Affecting Ectopic Break-Induced Replication." *PLOS Genetics* 18 (6): e1010124. <https://doi.org/10.1371/journal.pgen.1010124>.

Veller, Carl, Shunxin Wang, Denise Zickler, Liangran Zhang, and Nancy Kleckner. 2022. "Limitations of Gamete Sequencing for Crossover Analysis." *Nature* 606 (7913): E1–3. <https://doi.org/10.1038/s41586-022-04693-2>.

Vigueras-Meneses, Liliana Guadalupe, Ximena Escalera-Fanjul, Mohammed El-Hafidi, Javier Montalvo-Arredondo, Nicolás Gómez-Hernández, Maritrini Colón, Estefany Granados, et al. 2022. "Two Alpha

Isopropylmalate Synthase Isozymes with Similar Kinetic Properties Are Extant in the Yeast *Lachancea Kluyveri*." *FEMS Yeast Research* 22 (1): foac016. <https://doi.org/10.1093/femsyr/foac016>.

Wang, Yunfeng, Haoliang Xue, Marine Aglave, Antoine Lainé, Mélina Gallopin, and Daniel Gautheret. 2022. "The Contribution of Uncharted RNA Sequences to Tumor Identity in Lung Adenocarcinoma." *NAR Cancer* 4 (1): zcac001. <https://doi.org/10.1093/narcan/zcac001>.

Wang, Yucheng, Ana Prohaska, Haoran Dong, Adriana Alberti, Inger Greve Alsos, David W. Beilman, Anders A. Bjørk, et al. 2022. "Reply to: When Did Mammoths Go Extinct?" *Nature* 612 (7938): E4–6. <https://doi.org/10.1038/s41586-022-05417-2>.

Willems, Patrick, Pitter F. Huesgen, Iris Finkemeier, Emmanuelle Graciet, Thierry Meinnel, and Frank Van Breusegem. 2022. "Editorial: Plant Protein Termini: Their Generation, Modification and Function." *Frontiers in Plant Science* 13 (September). <https://www.frontiersin.org/articles/10.3389/fpls.2022.1040392>.

Zangarelli, Coralie, Olivier Arnaiz, Mickael Bourge, Kevin Gorrichon, Yan Jaszczyzyn, Nathalie Mathy, Loic Escoriza, Mireille Betermier, and Vinciane Regnier. 2022. "Developmental Timing of Programmed DNA Elimination in Paramecium Tetraurelia Recapitulates Germline Transposon Evolutionary Dynamics." *Genome Research*, November, gr.277027.122. <https://doi.org/10.1101/gr.277027.122>.

Zeitler, Leo, Cyril Denby Wilkes, Arach Goldar, and Julie Soutourina. 2022. "A Quantitative Modelling Approach for DNA Repair on a Population Scale." *PLOS Computational Biology* 18 (9): e1010488. <https://doi.org/10.1371/journal.pcbi.1010488>.

Gel-like Inclusions of C-Terminal Fragments of TDP-43 Sequester Stalled Proteasomes in Neurons. *EMBO reports* 2022, n/a (n/a), e53890. <https://doi.org/10.15252/embr.202153890>.

2021

Alpha-Bazin, Béatrice, Aurore Gorlas, Arnaud Lagorce, Damien Joulié, Jean-Baptiste Boyer, Murielle Dutertre, Jean-Charles Gaillard, et al. 2021. "Lysine-Specific Acetylated Proteome from the Archaeon *Thermococcus Gammatolerans* Reveals the Presence of Acetylated Histones." *Journal of Proteomics* 232 (February): 104044. <https://doi.org/10.1016/j.jprot.2020.104044>.

Anchimiuk, Anna, Virginia S. Lioy, Florian Patrick Bock, Anita Minnen, Frederic Boccard, and Stephan Gruber. 2021. "A Low Smc Flux Avoids Collisions and Facilitates Chromosome Organization in *Bacillus Subtilis*." *eLife* 10 (August): e65467. <https://doi.org/10.7554/eLife.65467>.

Andric, Vedrana, and Mathieu Rougemaille. 2021. "Long Non-Coding RNAs in the Control of Gametogenesis: Lessons from Fission Yeast." *Non-Coding RNA* 7 (2): 34. <https://doi.org/10.3390/ncrna7020034>.

Andric, Vedrana, Alicia Nevers, Ditipriya Hazra, Sylvie Auxilien, Alexandra Menant, Marc Graille, Benoit Palancade, and Mathieu Rougemaille. 2021. "A Scaffold LncRNA Shapes the Mitosis to Meiosis Switch." *Nature Communications* 12 (1): 770. <https://doi.org/10.1038/s41467-021-21032-7>.

André, Kévin M., Eliet H. Sipos, and Julie Soutourina. 2021. "Mediator Roles Going Beyond Transcription." *Trends in Genetics* 37 (3): 224–34. <https://doi.org/10.1016/j.tig.2020.08.015>.

Arnould, Coline, Vincent Rocher, Anne-Laure Finoux, Thomas Clouaire, Kevin Li, Felix Zhou, Pierre Caron, et al. 2021. "Loop Extrusion as a Mechanism for Formation of DNA Damage Repair Foci." *Nature* 590 (7847): 660–65. <https://doi.org/10.1038/s41586-021-03193-z>.

Bacle, Amélie, Pavel Buslaev, Rebeca Garcia-Fandino, Fernando Favela-Rosales, Tiago Mendes Ferreira, Patrick F. J. Fuchs, Ivan Gushchin, et al. 2021. "Inverse Conformational Selection in Lipid-Protein Binding." *Journal of the American Chemical Society* 143 (34): 13701–9. <https://doi.org/10.1021/jacs.1c05549>.

Beznosková, Petra, Laure Bidou, Olivier Namy, and Leoš Shivaya Valášek. 2021. "Increased Expression of Tryptophan and Tyrosine TRNAs Elevates Stop Codon Readthrough of Reporter Systems in Human Cell Lines." *Nucleic Acids Research* 49 (9): 5202–15. <https://doi.org/10.1093/nar/gkab315>.

Bokor, Eszter, Michel Flippi, Sándor Kocsbá, Judit Ámon, Csaba Vágvölgyi, Claudio Scazzocchio, and Zsuzsanna Hamari. 2021. "Genome Organization and Evolution of a Eukaryotic Nicotinate Co-Inducible Pathway." *Open Biology* 11 (9): 210099. <https://doi.org/10.1098/rsob.210099>.

Boudry, Pierre, Emma Piattelli, Emilie Drouineau, Johann Peltier, Anaïs Boutevin, Maxence Lejars, Eliane Hajnsdorf, et al. 2021. "Identification of RNAs Bound by Hfq Reveals Widespread RNA Partners and a Sporulation Regulator in the Human Pathogen Clostridioides difficile." *RNA Biology*, February, 1–22. <https://doi.org/10.1080/15476286.2021.1882180>.

Boussaid, Ismael, Salomé Le Goff, Célia Floquet, Emilie-Fleur Gautier, Anna Raimbault, Pierre-Julien Viallly, Dina Al Dulaimi, et al. 2021. "Integrated Analyses of Translatome and Proteome Identify the Rules of Translation Selectivity in RPS14-Deficient Cells." *Haematologica* 106 (3): 746–58. <https://doi.org/10.3324/haematol.2019.239970>.

Carlier, F., M. Li, L. Maroc, R. Debuchy, C. Souaid, D. Noordermeer, P. Grognat, and F. Malagnac. 2021. "Loss of EZH2-like or SU(VAR)3-9-like Proteins Causes Simultaneous Perturbations in H3K27 and H3K9 Tri-Methylation and Associated Developmental Defects in the Fungus Podospora Anserina." *Epigenetics & Chromatin* 14 (1): 22. <https://doi.org/10.1186/s13072-021-00395-7>.

Chen, Ziyan, Minjia Shen, Chengyao Mao, Chenyu Wang, Panhong Yuan, Tingzhang Wang, and Dongchang Sun. 2021. "A Type I Restriction Modification System Influences Genomic Evolution Driven by Horizontal Gene Transfer in Paenibacillus Polymyxa." *Frontiers in Microbiology* 12: 709571. <https://doi.org/10.3389/fmicb.2021.709571>.

Ciardo, Diletta, Olivier Haccard, Hemalatha Narassimprakash, Jean-Michel Arbona, Olivier Hyrien, Benjamin Audit, Kathrin Marheineke, and Arach Goldar. 2021. "Organization of DNA Replication Origin Firing in Xenopus Egg Extracts: The Role of Intra-S Checkpoint." *Genes* 12 (8): 1224. <https://doi.org/10.3390/genes12081224>.

Ciardo, Diletta, Olivier Haccard, Hemalatha Narassimprakash, David Cornu, Ida Chiara Guerrera, Arach Goldar, and Kathrin Marheineke. 2021. "Polo-like Kinase 1 (Plk1) Regulates DNA Replication Origin Firing and Interacts with Rif1 in Xenopus." *Nucleic Acids Research* 49 (17): 9851–69. <https://doi.org/10.1093/nar/gkab756>.

Crismani, Wayne, Chloe Girard, and Andrew Lloyd. 2021. "Crossover Interference: Just ZYP It." *Proceedings of the National Academy of Sciences of the United States of America* 118 (17): e2103433118. <https://doi.org/10.1073/pnas.2103433118>.

Tour, Claire Bouthier de la, Martine Mathieu, Pascale Servant, Geneviève Coste, Cédric Norais, and Fabrice Confalonieri. 2021. "Characterization of the DdrD Protein from the Extremely Radioresistant Bacterium Deinococcus Radiodurans." *Extremophiles*, May. <https://doi.org/10.1007/s00792-021-01233-0>.

Déléris, Angélique, Frédéric Berger, and Sandra Duharcourt. 2021. "Role of Polycomb in the Control of Transposable Elements." *Trends in Genetics: TIG*, June, S0168-9525(21)00144-X.
<https://doi.org/10.1016/j.tig.2021.06.003>.

Eugénie, Nicolas, Yvan Zivanovic, Gaelle Lelandais, Geneviève Coste, Claire Bouthier de la Tour, Esma Bentchikou, Pascale Servant, and Fabrice Confalonieri. 2021. "Characterization of the Radiation Desiccation Response Regulon of the Radioresistant Bacterium *Deinococcus Radiodurans* by Integrative Genomic Analyses." *Cells* 10 (10): 2536. <https://doi.org/10.3390/cells10102536>.

Fabret, Celine, and Olivier Namy. 2021. "Translational Accuracy of a Tethered Ribosome." *Nucleic Acids Research* 49 (9): 5308–18. <https://doi.org/10.1093/nar/gkab259>.

Fasemore, Akinyemi M., Andrea Helbich, Mathias C. Walter, Thomas Dandekar, Gilles Vergnaud, Konrad U. Förstner, and Dimitrios Frangoulidis. 2021. "CoxBase: An Online Platform for Epidemiological Surveillance, Visualization, Analysis, and Typing of *Coxiella Burnetii* Genomic Sequences." *MSystems*, December. <https://doi.org/10.1128/mSystems.00403-21>.

Fekete, Erzsébet, Fruzsina Pénzes, Norbert Ág, Claudio Scazzocchio, Michel Flippi, and Levente Karaffa. 2021. "Internally Symmetrical Stwintrons and Related Canonical Introns in Hypoxylaceae Species." *Journal of Fungi (Basel, Switzerland)* 7 (9): 710. <https://doi.org/10.3390/jof7090710>.

Finet, Olivier, Carlo Yague-Sanz, Lara Katharina Krüger, Phong Tran, Valérie Migeot, Max Louski, Alicia Nevers, et al. 2021. "Transcription-Wide Mapping of Dihydrouridine Reveals That mRNA Dihydrouridylation Is Required for Meiotic Chromosome Segregation." *Molecular Cell*, November, S1097-2765(21)00953-9. <https://doi.org/10.1016/j.molcel.2021.11.003>.

Foray, Anne-Perrine, Sophie Candon, Sara Hildebrand, Cindy Marquet, Fabrice Valette, Coralie Pecquet, Sébastien Lemoine, et al. 2021. "De Novo Germline Mutation in the Dual Specificity Phosphatase 10 Gene Accelerates Autoimmune Diabetes." *Proceedings of the National Academy of Sciences* 118 (47). <https://doi.org/10.1073/pnas.2112032118>.

Forey, Romain, Antoine Barthe, Mireille Tittel-Elmer, Maxime Wery, Marie-Bénédicte Barrault, Cécile Ducrot, Andrew Seeber, et al. 2021. "A Role for the Mre11-Rad50-Xrs2 Complex in Gene Expression and Chromosome Organization." *Molecular Cell* 81 (1): 183-197.e6.
<https://doi.org/10.1016/j.molcel.2020.11.010>.

Frottin, Frédéric, Manuela Pérez-Berlanga, F. Ulrich Hartl, and Mark S. Hipp. 2021. "Multiple Pathways of Toxicity Induced by C9orf72 Dipeptide Repeat Aggregates and G4C2 RNA in a Cellular Model." *eLife* 10 (June): e62718. <https://doi.org/10.7554/eLife.62718>.

Giglione, Carmela, and Thierry Meinnel. 2021. "Evolution-Driven Versatility of N Terminal Acetylation in Photoautotrophs." *Trends in Plant Science* 26 (4): 375–91.
<https://doi.org/10.1016/j.tplants.2020.11.012>.

Giglione, Carmela, and Thierry Meinnel. 2021. "Mapping the Myristoylome through a Complete Understanding of Protein Myristylation Biochemistry." *Progress in Lipid Research*, November, 101139. <https://doi.org/10.1016/j.plipres.2021.101139>.

Girard, Chloé, Chantal C. Akerib, and Anne M. Villeneuve. 2021. "Suppression of Him-14(lt44ts) by a Transgene Insertion Expressing GFP::COSA-1." *MicroPublication Biology* 2021.
<https://doi.org/10.17912/micropub.biology.000430>.

Girard, Chloe, Karine Budin, Stéphanie Boisnard, Liangran Zhang, Robert Debuchy, Denise Zickler, and Eric Espagne. 2021. "RNAi-Related Dicer and Argonaute Proteins Play Critical Roles for Meioocyte Formation, Chromosome-Axes Lengths and Crossover Patterning in the Fungus *Sordaria*

Macrospora." *Frontiers in Cell and Developmental Biology* 9 (June): 684108. <https://doi.org/10.3389/fcell.2021.684108>.

González-Alemán, Roy, Nicolas Chevrollier, Manuel Simoes, Luis Montero-Cabrera, and Fabrice Leclerc. 2021. "MCSS-Based Predictions of Binding Mode and Selectivity of Nucleotide Ligands." *Journal of Chemical Theory and Computation* 17 (4): 2599–2618. <https://doi.org/10.1021/acs.jctc.0c01339>.

González-Alemán, Roy, Daniel Platero-Rochart, David Hernández-Castillo, Erix W. Hernández-Rodríguez, Julio Caballero, Fabrice Leclerc, and Luis Montero-Cabrera. 2021. "BitQT: A Graph-Based Approach to the Quality Threshold Clustering of Molecular Dynamics." *Bioinformatics* (Oxford, England), August, btab595. <https://doi.org/10.1093/bioinformatics/btab595>.

Guérineau, Marc, Luiza Bessa, Séverine Moriau, Ewen Lescop, François Bontems, Nathalie Mathy, Eric Guittet, Julien Bischerour, Mireille Bétermier, and Nelly Morellet. 2021. "The Unusual Structure of the PiggyMac Cysteine-Rich Domain Reveals Zinc Finger Diversity in PiggyBac-Related Transposases." *Mobile DNA* 12 (1): 12. <https://doi.org/10.1186/s13100-021-00240-4>.

Ha, Kam Pou, and Andrew M. Edwards. 2021. "DNA Repair in *Staphylococcus Aureus*." *Microbiology and Molecular Biology Reviews: MMBR*, September, e0009121. <https://doi.org/10.1128/MMBR.00091-21>.

Hartmann, Fanny E., S. Lorena Ament-Velásquez, Aaron A. Vogan, Valérie Gautier, Stephanie Le Prieur, Myriam Berramdane, Alodie Snirc, et al. 2021. "Size Variation of the Non-Recombinant Region on the Mating-Type Chromosomes in the Fungal *Podospora Anserina* Species Complex." *Molecular Biology and Evolution*, February. <https://doi.org/10.1093/molbev/msab040>.

Hartmann, Fanny E., Marine Duhamel, Fantin Carpentier, Michael E. Hood, Marie Foulongne-Oriol, Philippe Silar, Fabienne Malagnac, Pierre Grochet, and Tatiana Giraud. 2021. "Recombination Suppression and Evolutionary Strata around Mating-Type Loci in Fungi: Documenting Patterns and Understanding Evolutionary and Mechanistic Causes." *New Phytologist* 229 (5): 2470–91. <https://doi.org/https://doi.org/10.1111/nph.17039>.

Kalvari, Ioanna, Eric P Nawrocki, Nancy Ontiveros-Palacios, Joanna Argasinska, Kevin Lamkiewicz, Manja Marz, Sam Griffiths-Jones, et al. 2021. "Rfam 14: Expanded Coverage of Metagenomic, Viral and MicroRNA Families." *Nucleic Acids Research* 49 (D1): D192–200. <https://doi.org/10.1093/nar/gkaa1047>.

Kuksin, Maria, Daphné Morel, Marine Aglave, François-Xavier Danlos, Aurélien Marabelle, Andrei Zinovyev, Daniel Gautheret, and Loïc Verlingue. 2021. "Applications of Single-Cell and Bulk RNA Sequencing in Onco-Immunology." *European Journal of Cancer* (Oxford, England: 1990) 149 (May): 193–210. <https://doi.org/10.1016/j.ejca.2021.03.005>.

L'Hôte, Valentin, Régis Courbeyrette, Guillaume Pinna, Jean-Christophe Cintrat, Gwenaëlle Le Pavec, Agnès Delaunay-Moisan, Carl Mann, and Jean-Yves Thuret. 2021. "Ouabain and Chloroquine Trigger Senolysis of BRAF-V600E-Induced Senescent Cells by Targeting Autophagy." *Aging Cell*, August, e13447. <https://doi.org/10.1111/ace.13447>.

Le Goff, Salomé, Ismael Boussaid, Celia Floquet, Anna Raimbault, Isabelle Hatin, Charlotte Andrieu-Soler, Mohammad Salma, et al. 2021. "P53 Activation during Ribosome Biogenesis Regulates Normal Erythroid Differentiation." *Blood* 137 (1): 89–102. <https://doi.org/10.1182/blood.2019003439>.

Le Huyen, Kim Boi, Cintia Daniela Gonzalez, Gaëtan Pascreau, Valérie Bordeau, Vincent Cattoir, Wenfeng Liu, Philippe Bouloc, Brice Felden, and Svetlana Chabelskaya. 2021. "A Small Regulatory RNA Alters

Staphylococcus Aureus Virulence by Titrating RNAlII Activity." Nucleic Acids Research, September, gkab782. <https://doi.org/10.1093/nar/gkab782>.

Li, Youfang Zhou, Stéphanie Boisnard, Adela Enache-Angoulvant, and Cécile Fairhead. 2021. "Genome Editing in the Yeast Nakaseomyces Delphensis and Description of Its Complete Sexual Cycle." Yeast 38 (1): 57–71. <https://doi.org/https://doi.org/10.1002/yea.3522>.

Lioy, Virginia S., Ivan Junier, and Frédéric Boccard. 2021. "Multiscale Dynamic Structuring of Bacterial Chromosomes." Annual Review of Microbiology, August. <https://doi.org/10.1146/annurev-micro-033021-113232>.

Lioy, Virginia S., Jean-Noël Lorenzi, Soumaya Nahaj, Thibault Poinsignon, Hervé Leh, Corinne Saulnier, Bertrand Aigle, et al. 2021. "Dynamics of the Compartmentalized Streptomyces Chromosome during Metabolic Differentiation." Nature Communications 12 (1): 5221. <https://doi.org/10.1038/s41467-021-25462-1>.

Mangelinck, Adèle, and Carl Mann. 2021. "DNA Methylation and Histone Variants in Aging and Cancer." International Review of Cell and Molecular Biology 364: 1–110.
<https://doi.org/10.1016/bs ircmb.2021.06.002>.

Monachello, Dario, Marc Lauraine, Sandra Gillot, François Michel, and Maria Costa. 2021. "A New RNA-DNA Interaction Required for Integration of Group II Intron Retrotransposons into DNA Targets." Nucleic Acids Research, November, gkab1031. <https://doi.org/10.1093/nar/gkab1031>.

Morgan, Chris, Martin A. White, F. Chris H. Franklin, Denise Zickler, Nancy Kleckner, and Kirsten Bomblies. 2021. "Evolution of Crossover Interference Enables Stable Autopolyploidy by Ensuring Pairwise Partner Connections in Arabidopsis Arenosa." Current Biology: CB, August, S0960-9822(21)01132-5. <https://doi.org/10.1016/j.cub.2021.08.028>.

Mullani, Nowsheen, Yevheniia Porozhan, Adèle Mangelinck, Christophe Rachez, Mickael Costallat, Eric Batsché, Michele Goodhardt, Giovanni Cenci, Carl Mann, and Christian Muchardt. 2021. "Reduced RNA Turnover as a Driver of Cellular Senescence." Life Science Alliance 4 (3).
<https://doi.org/10.26508/lsa.202000809>.

Nguyen, Ha T. N., Haoliang Xue, Virginie Firlej, Yann Ponty, Melina Gallopin, and Daniel Gautheret. 2021. "Reference-Free Transcriptome Signatures for Prostate Cancer Prognosis." BMC Cancer 21 (1): 394. <https://doi.org/10.1186/s12885-021-08021-1>.

Papadopoulos, Chris, Isabelle Callebaut, Jean-Christophe Gelly, Isabelle Hatin, Olivier Namy, Maxime Renard, Olivier Lespinet, and Anne Lopes. 2021. "Intergenic ORFs as Elementary Structural Modules of de Novo Gene Birth and Protein Evolution." Genome Research, November.
<https://doi.org/10.1101/gr.275638.121>.

Redon, Christophe E., Zoe Schmal, Gargi Tewary, Adèle Mangelinck, Régis Courbeyrette, Jean-Yves Thuret, Mirit I. Aladjem, William M. Bonner, Claudia E. Rübe, and Carl Mann. 2021. "Histone Variant H2A.J Is Enriched in Luminal Epithelial Gland Cells." Genes 12 (11): 1665. <https://doi.org/10.3390/genes12111665>.

Riquier, Sébastien, Chloé Bessiere, Benoit Guibert, Anne-Laure Bouge, Anthony Boureux, Florence Ruffle, Jérôme Audoux, et al. 2021. "Kmerator Suite: Design of Specific k-Mer Signatures and Automatic Metadata Discovery in Large RNA-Seq Datasets." NAR Genomics and Bioinformatics 3 (3): lqab058. <https://doi.org/10.1093/nargab/lqab058>.

Rougée, Martin, Leandro Quadrana, Jérôme Zervudacki, Valentin Hure, Vincent Colot, Lionel Navarro, and Angélique Deleris. 2021. "Polycomb Mutant Partially Suppresses DNA Hypomethylation-

Associated Phenotypes in Arabidopsis.” Life Science Alliance 4 (2).

<https://doi.org/10.26508/lsa.202000848>.

Sawka-Gądek, Natalia, Alexey Potekhin, Deepankar Pratap Singh, Inessa Grevtseva, Olivier Arnaiz, Simon Penel, Linda Sperling, et al. 2021. “Evolutionary Plasticity of Mating-Type Determination Mechanisms in Paramecium Aurelia Sibling Species.” Genome Biology and Evolution 13 (2): evaa258.

<https://doi.org/10.1093/gbe/evaa258>.

Sellis, Diamantis, Frédéric Guérin, Olivier Arnaiz, Walker Pett, Emmanuelle Lerat, Nicole Boggetto, Sascha Krenek, et al. 2021. “Massive Colonization of Protein-Coding Exons by Selfish Genetic Elements in Paramecium Germline Genomes.” PLOS Biology 19 (7): e3001309.

<https://doi.org/10.1371/journal.pbio.3001309>.

Shevtsov, Vladislav, Alma Kairzhanova, Alexandr Shevtsov, Alexandr Shustov, Ruslan Kalendar, Sarsenbay Abdrakhmanov, Larissa Lukhnova, Uinkul Izbanova, Yerlan Ramankulov, and Gilles Vergnaud. 2021. “Genetic Diversity of Francisella Tularensis Subsp. Holarctica in Kazakhstan.” PLOS Neglected Tropical Diseases 15 (5): e0009419. <https://doi.org/10.1371/journal.pntd.0009419>.

Shevtsov, Alexandr, Larissa Lukhnova, Uinkul Izbanova, Jean-Philippe Vernadet, Marat Kuibagarov, Asylulan Amirkazin, Yerlan Ramankulov, and Gilles Vergnaud. 2021. “Bacillus Anthracis Phylogeography: New Clues From Kazakhstan, Central Asia.” Frontiers in Microbiology 12: 3797. <https://doi.org/10.3389/fmicb.2021.778225>.

Singh, Suprita, Joana M. Santos, Lindsey M. Orchard, Naomi Yamada, Riëtte van Biljon, Heather J. Painter, Shaun Mahony, and Manuel Llinás. 2021. “The PfAP2-G2 Transcription Factor Is a Critical Regulator of Gametocyte Maturation.” Molecular Microbiology 115 (5): 1005–24. <https://doi.org/10.1111/mmi.14676>.

Sipos, Eliet H., Adélaïde Léty-Stefanska, Cyril Denby Wilkes, Julie Soutourina, and Florent Malloggi. 2021. “Microfluidic Platform for Monitoring Saccharomyces Cerevisiae Mutation Accumulation.” Lab on a Chip 21 (12): 2407–16. <https://doi.org/10.1039/d1lc00086a>.

Soulé, Antoine, Vladimir Reinhartz, Roman Sarrazin-Gendron, Alain Denise, and Jérôme Waldspühl. 2021. “Finding Recurrent RNA Structural Networks with Fast Maximal Common Subgraphs of Edge-Colored Graphs.” PLoS Computational Biology 17 (5): e1008990. <https://doi.org/10.1371/journal.pcbi.1008990>.

Sénécaut, Nicolas, Gelio Alves, Hendrik Weisser, Laurent Lignières, Samuel Terrier, Lilian Yang-Crosson, Pierre Poulain, Gaëlle Lelandais, Yi-Kuo Yu, and Jean-Michel Camadro. 2021. “Novel Insights into Quantitative Proteomics from an Innovative Bottom-Up Simple Light Isotope Metabolic (BSLM) Labeling Data Processing Strategy.” Journal of Proteome Research, February. <https://doi.org/10.1021/acs.jproteome.0c00478>.

Valadon, Charlène, and Olivier Namy. 2021. “The Importance of the Epi-Transcriptome in Translation Fidelity.” Non-Coding RNA 7 (3): 51. <https://doi.org/10.3390/ncrna7030051>.

Vingadassalon, Audrey, Florence Lorieux, Maud Juguet, Alba Noël, Luisa D. F. Santos, Laura Marin Fernandez, Jean-Luc Pernodet, Stéphanie Bury-Moné, and Sylvie Lautru. 2021. “Transcriptional Regulation of Congocidine (Netropsin) Biosynthesis and Resistance.” Applied and Environmental Microbiology, September, AEM0138021. <https://doi.org/10.1128/AEM.01380-21>.

Wang, Ji, Claire Toffano-Nioche, Florence Lorieux, Daniel Gautheret, and Jean Lehmann. 2021. “Accurate Characterization of Escherichia Coli tRNA Modifications with a Simple Method of Deep-Sequencing Library Preparation.” RNA Biology 18 (1): 33–46. <https://doi.org/10.1080/15476286.2020.1790871>.

Wang, Yunfeng, Haoliang Xue, Christine Pourcel, Yang Du, and Daniel Gautheret. 2021. "2-Kupl: Mapping-Free Variant Detection from DNA-Seq Data of Matched Samples." *BMC Bioinformatics* 22 (1): 304. <https://doi.org/10.1186/s12859-021-04185-6>.

Wang, Yucheng, Mikkel Winther Pedersen, Inger Greve Alsos, Bianca De Sanctis, Fernando Racimo, Ana Prohaska, Eric Coissac, et al. 2021. "Late Quaternary Dynamics of Arctic Biota from Ancient Environmental Genomics." *Nature*, October. <https://doi.org/10.1038/s41586-021-04016-x>.

Zaworski, Julie, Oyut Dagva, Anthony W. Kingston, Alexey Fomenkov, Richard D. Morgan, Lionello Bossi, and Elisabeth A. Raleigh. 2021. "Genome Archaeology of Two Laboratory *Salmonella Enterica* Enterica Sv Typhimurium." *G3 (Bethesda, Md.)* 11 (9): jkab226. <https://doi.org/10.1093/g3journal/jkab226>.

Zygmunt, Michel S., Gilles Vergnaud, and Axel Cloeckaert. 2021. "Whole-Genome Sequence of a *Brucella Pinnipedialis* Sequence Type 54 Strain Isolated from a Hooded Seal (*Cystophora Cristata*) from the North Atlantic Ocean, Norway." *Microbiology Resource Announcements* 10 (18): e00271-21. <https://doi.org/10.1128/MRA.00271-21>.

2020

Abello, Arthur, Vinciane Régnier, Olivier Arnaiz, Romain Le Bars, Mireille Bétermier, and Julien Bischerour. "Functional Diversification of Paramecium Ku80 Paralogs Safeguards Genome Integrity during Precise Programmed DNA Elimination." *PLoS Genetics* 16, no. 4 (2020): e1008723. <https://doi.org/10.1371/journal.pgen.1008723>.

Ament-Velásquez, S. Lorena, Hanna Johannesson, Tatiana Giraud, Robert Debuchy, Sven J. Saupe, Alfons J. M. Debets, Eric Bastiaans, et al. "The Taxonomy of the Model Filamentous Fungus *Podospora Anserina*." *MycoKeys* 75 (November 25, 2020): 51–69. <https://doi.org/10.3897/mycokeys.75.55968>.

Amirgazin, Asylulan, Gilles Vergnaud, Kasym Mukanov, Marat Kuibagarov, Talgat Karibaev, Yerlan Ramankulov, and Alexandr Shevtsov. "Draft Genome Sequences of Three *Pasteurella Multocida* Strains Isolated from Domestic Animals in Kazakhstan." *Microbiology Resource Announcements* 9, no. 32 (August 6, 2020): e00487-20. <https://doi.org/10.1128/MRA.00487-20>.

Amzal, Rachida, Alice Thébaut, Martine Lapalus, Marion Almes, Brigitte Grosse, Elodie Mareux, Mauricette Collado-Hilly, et al. "Pharmacological Premature Termination Codon Readthrough of ABCB11 in Bile Salt Export Pump Deficiency: An in Vitro Study." *Hepatology (Baltimore, Md.)*, July 23, 2020. <https://doi.org/10.1002/hep.31476>.

Armbruster, Laura, Eric Linster, Jean-Baptiste Boyer, Annika Brünje, Jürgen Eirich, Iwona Stephan, Willy V. Bienvenut, et al. "NAA50 Is an Enzymatically Active Nα-Acetyltransferase That Is Crucial for Development and Regulation of Stress Responses." *Plant Physiology* 183, no. 4 (2020): 1502–16. <https://doi.org/10.1104/pp.20.00222>.

Armengaud, Jean, Agnès Delaunay-Moisan, Jean-Yves Thuret, Eelco van Anken, Diego Acosta-Alvear, Tomás Aragón, Carolina Arias, et al. "The Importance of Naturally Attenuated SARS-CoV-2 in the Fight against COVID-19." *Environmental Microbiology* 22, no. 6 (2020): 1997–2000. <https://doi.org/10.1111/1462-2920.15039>.

Arnaiz, Olivier, Eric Meyer, and Linda Sperling. "ParameciumDB 2019: Integrating Genomic Data across the Genus for Functional and Evolutionary Biology." *Nucleic Acids Research* 48, no. D1 (2020): D599–605. <https://doi.org/10.1093/nar/gkz948>.

Asif-Ladin, Amna, Christine Conesa, Amandine Bonnet, Camille Grison, Indranil Adhya, Rachid Menouni, Hélène Fayol, Noé Palmic, Joel Acker, and Pascale Lesage. "A Small Targeting Domain in Ty1 Integrase Is Sufficient to Direct Retrotransposon Integration Upstream of tRNA Genes." *Embo Journal* 39, no. 17 (September 1, 2020): e104337. <https://doi.org/10.15252/embj.2019104337>.

Bétermier, Mireille, Valérie Borde, and Jean-Pierre de Villartay. "Coupling DNA Damage and Repair: An Essential Safeguard during Programmed DNA Double-Strand Breaks?" *Trends in Cell Biology* 30, no. 2 (2020): 87–96. <https://doi.org/10.1016/j.tcb.2019.11.005>.

Bienvenut, Willy V., Annika Brünje, Jean-Baptiste Boyer, Jens S. Mühlenbeck, Gautier Bernal, Ines Lassowskat, Cyril Dian, et al. "Dual Lysine and N-Terminal Acetyltransferases Reveal the Complexity Underpinning Protein Acetylation." *Molecular Systems Biology* 16, no. 7 (July 2020): e9464. <https://doi.org/10.1525/msb.20209464>.

Bossi, Lionello, Nara Figueroa-Bossi, Philippe Bouloc, and Marc Boudvillain. "Regulatory Interplay between Small RNAs and Transcription Termination Factor Rho." *Biochimica et Biophysica Acta (BBA) - Gene Regulatory Mechanisms* 1863, no. 7 (July 1, 2020): 194546. <https://doi.org/10.1016/j.bbagr.2020.194546>.

Chang, Li-Hsin, Sourav Ghosh, and Daan Noordermeer. "TADs and Their Borders: Free Movement or Building a Wall?" *Journal of Molecular Biology* 432, no. 3 (2020): 643–52. <https://doi.org/10.1016/j.jmb.2019.11.025>.

Chang, Li-Hsin, and Daan Noordermeer. "Of Dots and Stripes: The Morse Code of Micro-C Reveals the Ultrastructure of Transcriptional and Architectural Mammalian 3D Genome Organization." *Molecular Cell* 78, no. 3 (May 7, 2020): 376–78. <https://doi.org/10.1016/j.molcel.2020.04.021>.

Chu, Lingluo, Zhangyi Liang, Maria Mukhina, Jay Fisher, Nadine Vincenten, Zheng Zhang, John Hutchinson, Denise Zickler, and Nancy Kleckner. "The 3D Topography of Mitotic Chromosomes." *Molecular Cell* 79, no. 6 (September 17, 2020): 902–16. <https://doi.org/10.1016/j.molcel.2020.07.002>.

Ciardo, Diletta, Olivier Haccard, Hemalatha Narassimprakash, Virginie Chiodelli, Arach Goldar, and Kathrin Marheineke. "Polo-like Kinase 1 (Plk1) Is a Positive Regulator of DNA Replication in the Xenopus in Vitro System." *Cell Cycle (Georgetown, Tex.)* 19, no. 14 (July 17, 2020): 1817–32. <https://doi.org/10.1080/15384101.2020.1782589>.

Cloeckaert, Axel, Gilles Vergnaud, and Michel S. Zygmunt. "Omp2b Porin Alteration in the Course of Evolution of *Brucella* Spp." *Frontiers in Microbiology* 11 (2020): 284. <https://doi.org/10.3389/fmicb.2020.00284>.

Coker, Heather, Guifeng Wei, Benoit Moindrot, Shabaz Mohammed, Tatyana Nesterova, and Neil Brockdorff. "The Role of the Xist 5' M6A Region and RBM15 in X Chromosome Inactivation." *Wellcome Open Research* 5 (2020): 31. <https://doi.org/10.12688/wellcomeopenres.15711.1>.

Daniel, Sandra, Kelly Goldlust, Valentin Quebre, Minjia Shen, Christian Lesterlin, Jean-Yves Bouet, and Yoshiharu Yamaichi. "Vertical and Horizontal Transmission of ESBL Plasmid from *Escherichia Coli* O104:H4." *Genes* 11, no. 10 (October 16, 2020): 1207. <https://doi.org/10.3390/genes11101207>.

Denecker, Thomas, Youfang Zhou Li, Cécile Fairhead, Karine Budin, Jean-Michel Camadro, Monique Bolotin-Fukuhara, Adela Angoulvant, and Gaëlle Lelandais. "Functional Networks of Co-Expressed Genes to Explore Iron Homeostasis Processes in the Pathogenic Yeast *Candida Glabrata*." *NAR Genomics and Bioinformatics* 2, no. 2 (June 2020): lqaa027. <https://doi.org/10.1093/nargab/lqaa027>.

Dian, Cyril, Inmaculada Pérez-Dorado, Frédéric Rivière, Thomas Asensio, Pierre Legrand, Markus Ritzefeld, Mengjie Shen, et al. "High-Resolution Snapshots of Human N-Myristoyltransferase in Action Illuminate a Mechanism Promoting N-Terminal Lys and Gly Myristylation." *Nature Communications* 11, no. 1 (February 28, 2020): 1132. <https://doi.org/10.1038/s41467-020-14847-3>.

Espinosa, Elena, Evelyne Paly, and Francois-Xavier Barre. "High-Resolution Whole-Genome Analysis of Sister-Chromatid Contacts." *Molecular Cell* 79, no. 5 (September 3, 2020): 857–69. <https://doi.org/10.1016/j.molcel.2020.06.033>.

Essoh, Christiane, Jean-Philippe Vernadet, Gilles Vergnaud, Adama Coulibaly, Adèle Kakou-N'Douba, Assavo S.-P. N'Guetta, Thimotée Ouassa, and Christine Pourcel. "Characterization of Sixteen Achromobacter Xylosoxidans Phages from Abidjan, Côte d'Ivoire, Isolated on a Single Clinical Strain." *Archives of Virology* 165, no. 3 (March 1, 2020): 725–30. <https://doi.org/10.1007/s00705-019-04511-7>.

Fomenkov, Alexey, Zhiyi Sun, Iain A Murray, Cristian Ruse, Colleen McClung, Yoshiharu Yamaichi, Elisabeth A Raleigh, and Richard J Roberts. "Plasmid Replication-Associated Single-Strand-Specific Methyltransferases." *Nucleic Acids Research* 48, no. 22 (December 16, 2020): 12858–73. <https://doi.org/10.1093/nar/gkaa1163>.

Gainer, Robert S., Gilles Vergnaud, and Martin E. Hugh-Jones. "A Review of Arguments for the Existence of Latent Infections OfBacillus Anthracis, and Research Needed to Understand Their Role in the Outbreaks of Anthrax." *Microorganisms* 8, no. 6 (June 2020): 800. <https://doi.org/10.3390/microorganisms8060800>.

Godat, Emmanuel, Jean-Charles Preiser, Jean-Christophe Aude, and Pierre Kalfon. "Dynamic Properties of Glucose Complexity during the Course of Critical Illness: A Pilot Study." *Journal of Clinical Monitoring and Computing* 34, no. 2 (April 2020): 361–70. <https://doi.org/10.1007/s10877-019-00299-8>.

Gogendeau, Delphine, Michel Lemullois, Pierrick Le Borgne, Manon Castelli, Anne Aubusson-Fleury, Olivier Arnaiz, Jean Cohen, et al. "MKS-NPHP Module Proteins Control Ciliary Shedding at the Transition Zone." *PLoS Biology* 18, no. 3 (2020): e3000640. <https://doi.org/10.1371/journal.pbio.3000640>.

Graille, Marc, and Mathieu Rougemaille. "ERH Proteins: Connecting RNA Processing to Tumorigenesis?" *Current Genetics* 66, no. 4 (August 2020): 689–92. <https://doi.org/10.1007/s00294-020-01065-z>.

Hadjadj, Djihad, Thomas Denecker, Eva Guérin, Su-Jung Kim, Fabien Fauchereau, Giuseppe Baldacci, Chrystelle Maric, and Jean-Charles Cadoret. "Efficient, Quick and Easy-to-Use DNA Replication Timing Analysis with START-R Suite." *NAR Genomics and Bioinformatics* 2, no. 2 (June 19, 2020). <https://doi.org/10.1093/nargab/lqaa045>.

Hazra, Ditipriya, Vedrana Andrić, Benoit Palancade, Mathieu Rougemaille, and Marc Graille. "Formation of S. Pombe Erh1 Homodimer Mediates Gametogenic Gene Silencing and Meiosis Progression." *Scientific Reports* 10, no. 1 (January 23, 2020): 1034. <https://doi.org/10.1038/s41598-020-57872-4>.

Huber, Monika, Willy V. Bienvenut, Eric Linster, Iwona Stephan, Laura Armbruster, Carsten Sticht, Dominik Layer, et al. "NatB-Mediated N-Terminal Acetylation Affects Growth and Biotic Stress Responses." *Plant Physiology* 182, no. 2 (February 2020): 792–806. <https://doi.org/10.1104/pp.19.00792>.

Isermann, Anna, Carl Mann, and Claudia E. Rübe. "Histone Variant H2A.J Marks Persistent DNA Damage and Triggers the Secretory Phenotype in Radiation-Induced Senescence." *International Journal of Molecular Sciences* 21, no. 23 (November 30, 2020): 9130. <https://doi.org/10.3390/ijms21239130>.

Ithurbide, Solenne, Geneviève Coste, Johnny Lisboa, Nicolas Eugénie, Esma Bentchikou, Claire Bouthier de la Tour, Dominique Liger, et al. "Natural Transformation in Deinococcus Radiodurans: A Genetic Analysis Reveals the Major Roles of DprA, DdrB, RecA, RecF, and RecO Proteins." *Frontiers in Microbiology* 11 (2020): 1253. <https://doi.org/10.3389/fmicb.2020.01253>.

Kuibagarov, Marat, Asylulan Amirgazin, Gilles Vergnaud, Alexandre Shustov, Anara Ryskeldina, Yerlan Ramankulov, and Alexandre Shevtsov. "Draft Genome Sequence of Moraxella Bovoculi Strain KZ-1, Isolated from Cattle in North Kazakhstan." *Microbiology Resource Announcements* 9, no. 30 (July 2020): e00670-20. <https://doi.org/10.1128/MRA.00670-20>.

Kuibagarov, Marat, Alma Kairzhanova, Gilles Vergnaud, Asylulan Amirgazin, Larissa Lukhnova, Uinkul Izbanova, Yerlan Ramankulov, and Alexandre Shevtsov. "Draft Genome Sequence of the Strain Francisella Tularensis Subsp. Mediasiatica 240, Isolated in Kazakhstan." *Microbiology Resource Announcements* 9, no. 35 (August 2020): e00766-20. <https://doi.org/10.1128/MRA.00766-20>.

Lacoux, Caroline, Aymeric Fouquier d'Hérouël, Françoise Wessner-Le Bohec, Nicolas Innocenti, Chantal Bohn, Sean P. Kennedy, Tatiana Rochat, et al. "Dynamic Insights on Transcription Initiation and RNA Processing during Bacterial Adaptation." *RNA (New York, N.Y.)* 26, no. 4 (April 2020): 382–95. <https://doi.org/10.1261/rna.073288.119>.

Lebreton, Annie, Erwan Corre, Jean-Luc Jany, Loraine Brillet-Guéguen, Carlos Pérez-Arques, Victoriano Garre, Misharl Monsoor, et al. "Comparative Genomics Applied to Mucor Species with Different Lifestyles." *BMC Genomics* 21, no. 1 (February 10, 2020): 135. <https://doi.org/10.1186/s12864-019-6256-2>.

Linster, Eric, Dominik Layer, Willy V. Bienvenut, Trinh V. Dinh, Felix A. Weyer, Wiebke Leemhuis, Annika Brünje, et al. "The Arabidopsis Nα-Acetyltransferase NAA60 Locates to the Plasma Membrane and Is Vital for the High Salt Stress Response." *New Phytologist* 228, no. 2 (2020): 554–69. <https://doi.org/https://doi.org/10.1111/nph.16747>.

Lioy, Virginia, Jean-Noel Lorenzi, Soumaya Najah, Thibault Poinsignon, Herve Leh, Corinne Saulnier, Bertrand Aigle, et al. "Dynamics of the Compartmentalized Streptomyces Chromosome during Metabolic Differentiation." *BioRxiv*, December 9, 2020, 2020.12.09.415976. <https://doi.org/10.1101/2020.12.09.415976>.

Lioy, Virginia S., Ivan Junier, Valentine Lagage, Isabelle Vallet, and Frédéric Boccard. "Distinct Activities of Bacterial Condensins for Chromosome Management in Pseudomonas Aeruginosa." *Cell Reports* 33, no. 5 (November 3, 2020): 108344. <https://doi.org/10.1016/j.celrep.2020.108344>.

Liu, Wenfeng, Pierre Boudry, Chantal Bohn, and Philippe Bouloc. "Staphylococcus Aureus Pigmentation Is Not Controlled by Hfq." *BMC Research Notes* 13, no. 1 (February 7, 2020): 63. <https://doi.org/10.1186/s13104-020-4934-4>.

Marchet, Camille, Zamin Iqbal, Daniel Gautheret, Mikaël Salson, and Rayan Chikhi. "REINDEER: Efficient Indexing of k-Mer Presence and Abundance in Sequencing Datasets." *Bioinformatics* 36, no. Supplement_1 (July 1, 2020): i177–85. <https://doi.org/10.1093/bioinformatics/btaa487>.

Marichal, Laurent, Geraldine Klein, Jean Armengaud, Yves Boulard, Stephane Chedin, Jean Labarre, Serge Pin, Jean-Philippe Renault, and Jean-Christophe Aude. "Protein Corona Composition of Silica Nanoparticles in Complex Media: Nanoparticle Size Does Not Matter." *Nanomaterials* 10, no. 2 (February 2020): 240. <https://doi.org/10.3390/nano10020240>.

Maroc, Laetitia, Youfang Zhou-Li, Stéphanie Boisnard, and Cécile Fairhead. "A Single Ho-Induced Double-Strand Break at the MAT Locus Is Lethal in Candida Glabrata." *PLOS Genetics* 16, no. 10 (October 15, 2020): e1008627. <https://doi.org/10.1371/journal.pgen.1008627>.

Maurel, Marie-Christine, Fabrice Leclerc, and Guy Herve. "Ribozyme Chemistry: To Be or Not To Be under High Pressure." *Chemical Reviews* 120, no. 11 (June 11, 2020): 4898–4918. <https://doi.org/10.1021/acs.chemrev.9b00457>.

Meinnel, Thierry, Cyril Dian, and Carmela Giglione. "Myristoylation, an Ancient Protein Modification Mirroring Eukaryogenesis and Evolution." *Trends in Biochemical Sciences* 45, no. 7 (July 1, 2020): 619–32. <https://doi.org/10.1016/j.tibs.2020.03.007>.

Nguyen, Hoang Quy, Yazid Belkacemi, Carl Mann, Françoise Hoffschir, Stéphane Kerbrat, Mathieu Surenaud, Patricia Zadigue, Alexandre de La Taille, Paul-Henri Romeo, and Sabine Le Gouvello. "Human CCR6+ Th17 Lymphocytes Are Highly Sensitive to Radiation-Induced Senescence and Are a Potential Target for Prevention of Radiation-Induced Toxicity." *International Journal of Radiation Oncology, Biology, Physics* 108, no. 1 (September 1, 2020): 314–25. <https://doi.org/10.1016/j.ijrobp.2019.10.045>.

Noordermeer, Daan. "3D Genome Organization: Setting the Stage and Introducing Its Players." *Briefings in Functional Genomics* 19, no. 2 (March 2020): 69–70. <https://doi.org/10.1093/bfgp/elaa006>.

Noordermeer, Daan, and Robert Feil. "Differential 3D Chromatin Organization and Gene Activity in Genomic Imprinting." *Current Opinion in Genetics & Development* 61 (April 1, 2020): 17–24. <https://doi.org/10.1016/j.gde.2020.03.004>.

Phongsavanh, Xaysongkhame, Noha Al-Qatabi, Mohammed Samer Shaban, Fawzi Khoder-Agha, Merwan El Asri, Martine Comisso, Raphaël Guérois, and Marc Mirande. "How HIV-1 Integrase Associates with Human Mitochondrial Lysyl-tRNA Synthetase." *Viruses* 12, no. 10 (2020): 1202. <https://doi.org/10.3390/v12101202>.

- Pourcel, Christine. "New Insights into CRISPR Arrays." *The CRISPR Journal* 3, no. 6 (December 1, 2020): 422–24. <https://doi.org/10.1089/crispr.2020.29111.cpo>.
- Pourcel, Christine, Cédric Midoux, Gilles Vergnaud, and Libera Latino. "The Basis for Natural Multiresistance to Phage in Pseudomonas Aeruginosa." *Antibiotics (Basel, Switzerland)* 9, no. 6 (June 18, 2020): 339. <https://doi.org/10.3390/antibiotics9060339>.
- Pourcel, Christine, Marie Touchon, Nicolas Villeriot, Jean-Philippe Vernadet, David Couvin, Claire Toffano-Nioche, and Gilles Vergnaud. "CRISPRCasdb a Successor of CRISPRdb Containing CRISPR Arrays and Cas Genes from Complete Genome Sequences, and Tools to Download and Query Lists of Repeats and Spacers." *Nucleic Acids Research* 48, no. D1 (2020): D535–D544. <https://doi.org/10.1093/nar/gkz915>.
- Rougée, Martin, Leandro Quadrana, Jérôme Zervudacki, Vincent Colot, Lionel Navarro, and Angélique Deleris. "Altering Polycomb Repressive Complex 2 Activity Partially Suppresses Ddm1 Mutant Phenotypes in Arabidopsis." *BioRxiv*, June 2, 2020, 782219. <https://doi.org/10.1101/782219>.
- Sabeti Azad, Mahnaz, Maho Okuda, Mélina Cyrenne, Mickael Bourge, Marie-Pierre Heck, Satoko Yoshizawa, and Dominique Fourmy. "Fluorescent Aminoglycoside Antibiotics and Methods for Accurately Monitoring Uptake by Bacteria." *ACS Infectious Diseases* 6, no. 5 (May 8, 2020): 1008–17. <https://doi.org/10.1021/acsinfecdis.9b00421>.
- Saghäi, Aurélien, Yvan Zivanovic, David Moreira, Rosaluz Tavera, and Purificación López-García. "A Novel Microbialite-Associated Phototrophic Chloroflexi Lineage Exhibiting a Quasi-Clonal Pattern along Depth." *Genome Biology and Evolution* 12, no. 7 (July 1, 2020): 1207–16. <https://doi.org/10.1093/gbe/evaa122>.
- Schweke, Hugo, Marie-Hélène Mucchielli, Sophie Sacquin-Mora, Wanying Bei, and Anne Lopes. "Protein Interaction Energy Landscapes Are Shaped by Functional and Also Non-Functional Partners." *Journal of Molecular Biology* 432, no. 4 (February 14, 2020): 1183–98. <https://doi.org/10.1016/j.jmb.2019.12.047>.
- Shevtsov, Alexandre, Gilles Vergnaud, Asylulan Amirgazin, Larissa Lukhnova, Uinkul Izbanova, Vladislav Shevtsov, and Yerlan Ramankulov. "Retrospective Analysis of the Relationship between Two Anthrax Outbreaks in Kazakhstan Based on Genomic Data." *Microbiology Resource Announcements* 9, no. 50 (December 10, 2020). <https://doi.org/10.1128/MRA.01126-20>.
- Sinha, Anurag Kumar, Christophe Possoz, and David R. F. Leach. "The Roles of Bacterial DNA Double-Strand Break Repair Proteins in Chromosomal DNA Replication." *FEMS Microbiology Reviews* 44, no. 3 (May 2020): 351–68. <https://doi.org/10.1093/femsre/fuaa009>.
- Sperling, Linda. "Janine Beisson, Pioneer of Cytoplasmic Heredity (June 9, 1931, Saïda – August 30, 2020, Megève)." *Protist* 171, no. 6 (2020): 125769. <https://doi.org/10.1016/j.protis.2020.125769>.
- Steunou, Anne Soisig, Marion Babot, Marie-Line Bourbon, Reem Tambosi, Anne Durand, Sylviane Liotenberg, Anja Krieger-Liszakay, Yoshiharu Yamaichi, and Soufian Ouchane. "Additive Effects of Metal Excess and Superoxide, a Highly Toxic Mixture in Bacteria." *Microbial Biotechnology* 13, no. 5 (2020): 1515–29. <https://doi.org/https://doi.org/10.1111/1751-7915.13589>.
- Steunou, Anne Soisig, Marie-Line Bourbon, Marion Babot, Anne Durand, Sylviane Liotenberg, Yoshiharu Yamaichi, and Soufian Ouchane. "Increasing the Copper Sensitivity of Microorganisms by Restricting Iron Supply, a Strategy for Bio-Management Practices." *Microbial Biotechnology* 13, no. 5 (2020): 1530–45. <https://doi.org/https://doi.org/10.1111/1751-7915.13590>.
- Suissa, Laurent, Virginie Flachon, Jean-Marie Guigonis, Charles-Vivien Olivieri, Fanny Burel-Vandenbos, Julien Guglielmi, Damien Ambrosetti, et al. "Urinary Ketone Body Loss Leads to Degeneration of Brain White Matter in Elderly SLC5A8-Deficient Mice." *Journal of Cerebral Blood Flow & Metabolism* 40, no. 8 (August 1, 2020): 1709–23. <https://doi.org/10.1177/0271678X19873662>.
- Vanssay, Augustin de, Amandine Touzeau, Olivier Arnaiz, Andrea Frapparti, Jamie Phipps, and Sandra Duharcourt. "The Paramecium Histone Chaperone Spt16-1 Is Required for Pgm Endonuclease Function in Programmed Genome Rearrangements." *PLoS Genetics* 16, no. 7 (2020): e1008949. <https://doi.org/10.1371/journal.pgen.1008949>.

Vergnaud, Gilles. "Bacillus Anthracis Evolutionary History: Taking Advantage of the Topology of the Phylogenetic Tree and of Human History to Propose Dating Points." *Erciyes Medical Journal* 42, no. 4 (2020): 362–69. <https://doi.org/10.14744/etd.2020.64920>.

Xu, Xi, Chaoju Gong, Yunfeng Wang, Yanyan Hu, Hong Liu, and Zejun Fang. "Multi-Omics Analysis to Identify Driving Factors in Colorectal Cancer." *Epigenomics* 12, no. 18 (June 23, 2020): 1633–50. <https://doi.org/10.2217/epi-2020-0073>.

Yano, Hirokazu, Md Zobaidul Alam, Emiko Rimbara, Tomoko F. Shibata, Masaki Fukuyo, Yoshikazu Furuta, Tomoaki Nishiyama, et al. "Corrigendum: Networking and Specificity-Changing DNA Methyltransferases in Helicobacter Pylori." *Frontiers in Microbiology* 11 (2020): 596598. <https://doi.org/10.3389/fmicb.2020.596598>.

———. "Networking and Specificity-Changing DNA Methyltransferases in Helicobacter Pylori." *Frontiers in Microbiology* 11 (2020): 1628. <https://doi.org/10.3389/fmicb.2020.01628>.

Zickler, Denise. "Diter von Wettstein and The Meiotic Program of Pairing and Recombination." *Methods in Molecular Biology (Clifton, N.J.)* 2124 (2020): 19–35. https://doi.org/10.1007/978-1-0716-0356-7_2.