

Palma CSD, Kandavalli V, Bahrudeen MNM, Minoia M, Chauhan V, Dash S et al. **Dissecting the in vivo dynamics of transcription locking due to positive supercoiling buildup.** *Biochimica et Biophysica Acta - Gene Regulatory Mechanisms*. 2020;1863(5): 194515. <https://doi.org/10.1016/j.bbagr.2020.194515>

Vanharanta L, Peränen J, Pfisterer SG, Enkavi G, Vattulainen I, Ikonen E. **High-content imaging and structure-based predictions reveal functional differences between Niemann-Pick C1 variants.** *Traffic*. 2020;21(5):386-397. <https://doi.org/10.1111/tra.12727>

Liekkinen J, Enkavi G, Javanainen M, Olmeda B, Pérez-Gil J, Vattulainen I. **Pulmonary Surfactant Lipid Reorganization Induced by the Adsorption of the Oligomeric Surfactant Protein B Complex.** *JOURNAL OF MOLECULAR BIOLOGY*. 2020;432(10):3251-3268. <https://doi.org/10.1016/j.jmb.2020.02.028>

Johansson JK, Karema-Jokinen VI, Hakanen S, Jylhä A, Uusitalo H, Vihinen-Ranta M et al. **Sodium channels enable fast electrical signaling and regulate phagocytosis in the retinal pigment epithelium.** *BMC BIOLOGY*. 2019 elo 15;17(1): 63. <https://doi.org/10.1186/s12915-019-0681-1>

Manna M, Nieminen T, Vattulainen I. **Understanding the Role of Lipids in Signaling Through Atomistic and Multiscale Simulations of Cell Membranes.** *ANNUAL REVIEW OF BIOPHYSICS*. 2019 touko 6;48:421-439. <https://doi.org/10.1146/annurev-biophys-052118-115553>

Liimatainen K, Kananen L, Latonen L, Ruusuvoori P. **Iterative unsupervised domain adaptation for generalized cell detection from brightfield z-stacks.** *BMC Bioinformatics*. 2019 helmi 15;20(1): 80. <https://doi.org/10.1186/s12859-019-2605-z>

Startceva S, Kandavalli VK, Visa A, Ribeiro AS. **Regulation of asymmetries in the kinetics and protein numbers of bacterial gene expression.** *Biochimica et Biophysica Acta - Gene Regulatory Mechanisms*. 2019 helmi 1;1862(2):119-128. <https://doi.org/10.1016/j.bbagr.2018.12.005>

Laulumaa S, Nieminen T, Raasakka A, Krokengen OC, Safaryan A, Hallin EI et al. **Structure and dynamics of a human myelin protein P2 portal region mutant indicate opening of the β barrel in fatty acid binding proteins.** *BMC Structural Biology*. 2018 kesä 25;18(1): 8. <https://doi.org/10.1186/s12900-018-0087-2>

Neeli-Venkata R, Oliveira SMD, Martins L, Startceva S, Bahrudeen M, Fonseca JM et al. **The precision of the symmetry in Z-ring placement in Escherichia coli is hampered at critical temperatures.** *Physical Biology*. 2018 touko 18;15(5): 056002. <https://doi.org/10.1088/1478-3975/aac1cb>

Ferreira ARV, Haapanen J, Mäkelä JM, Bratvold JE, Nilsen O, Tuominen M et al. **Comparison of different coating techniques on the properties of FucoPol films.** *International Journal of Biological Macromolecules*. 2017 loka 1;103:268-274. <https://doi.org/10.1016/j.ijbiomac.2017.05.021>

Tripathi S, Lloyd-Price J, Ribeiro A, Yli-Harja O, Dehmer M, Emmert-Streib F. **sgnesR: An R package for simulating gene expression data from an underlying real gene network structure considering delay parameters.** *BMC Bioinformatics*. 2017 heinä 4;18(1): 325. <https://doi.org/10.1186/s12859-017-1731-8>

Rahmatallah Y, Zybailov B, Emmert-Streib F, Glazko G. **GSAR: Bioconductor package for Gene Set analysis in R.** *BMC Bioinformatics*. 2017 tammi 24;18(1): 61. <https://doi.org/10.1186/s12859-017-1482-6>

Kandavalli VK, Tran H, Ribeiro AS. **Effects of σ factor competition are promoter initiation kinetics dependent.** *Biochimica et Biophysica Acta: Gene Regulatory Mechanisms*. 2016 loka 1;1859(10):1281-1288. <https://doi.org/10.1016/j.bbagr.2016.07.011>

Koivuniemi A, Vattulainen I. **Biogenesis of Nascent High Density Lipoprotein Particles.** *Structure*. 2015 heinä 9;23(7):1153-1154. 3212. <https://doi.org/10.1016/j.str.2015.06.006>

Matos Simoes RD, Dalleau S, Williamson KE, Emmert-Streib F. **Urothelial cancer gene regulatory networks inferred from large-scale RNaseq, Bead and Oligo gene expression data.** BMC Systems Biology. 2015 touko 14;9: 21. <https://doi.org/10.1186/s12918-015-0165-z>

Moriya T, Acar E, Cheng RH, Ruotsalainen U. **A Bayesian approach for suppression of limited angular sampling artifacts in single particle 3D reconstruction.** Journal of Structural Biology. 2015 huhti 3;191(3):318–331. <https://doi.org/10.1016/j.jsb.2015.07.007>

Rahmatallah Y, Emmert-Streib F, Glazko G. **Comparative evaluation of gene set analysis approaches for RNA-Seq data.** BMC Bioinformatics. 2014 joulu 5;15(1). 397. <https://doi.org/10.1186/s12859-014-0397-8>

Kokkola T, Suuronen T, Molnár F, Määttä J, Salminen A, Jarho EM et al. **AROS has a context-dependent effect on SIRT1.** FEBS Letters. 2014 touko 2;588(9):1523-1528. <https://doi.org/10.1016/j.febslet.2014.03.020>

Rangl M, Leitner M, Riihimäki T, Lehtonen S, Hytönen VP, Gruber HJ et al. **Investigating the binding behaviour of two avidin-based testosterone binders using molecular recognition force spectroscopy.** Journal of Molecular Recognition. 2014 helmi;27(2):92-97. <https://doi.org/10.1002/jmr.2337>

Emmert-Streib F, de Matos Simoes R, Glazko G, McDade S, Haibe-Kains B, Holzinger A et al. **Functional and genetic analysis of the colon cancer network.** BMC Bioinformatics. 2014;15(Suppl 6). S6.

Anantharajan J, Koski MK, Kursula P, Hieta R, Bergmann U, Myllyharju J et al. **The structural motifs for substrate binding and dimerization of the α subunit of collagen prolyl 4-hydroxylase.** Structure. 2013 joulu 3;21(12):2107-2118. <https://doi.org/10.1016/j.str.2013.09.005>

Sharma V, Misteli T. **Non-coding RNAs in DNA damage and repair.** FEBS Letters. 2013 kesä 27;587(13):1832-1839. <https://doi.org/10.1016/j.febslet.2013.05.006>

Tossavainen H, Helppolainen SH, Määttä JAE, Pihlajamaa T, Hytönen VP, Kulomaa MS et al. **Resonance assignments of the 56 kDa chimeric avidin in the biotin-bound and free forms.** BIOMOLECULAR NMR ASSIGNMENTS. 2013 huhti;7(1):35-38. <https://doi.org/10.1007/s12104-012-9371-4>

Lisitsyna ES, Durandin NA, Ivanov AA, Streltsov SA, Susova OY, Shtil AA et al. **Characteristics of complex formation between monomeric and dimeric bisbenzimidazoles and AT-containing polynucleotide.** MOLECULAR BIOLOGY. 2012 marras;46(6):823-827. <https://doi.org/10.1134/S0026893312060131>

de Matos Simoes R, Tripathi S, Emmert-Streib F. **Organizational structure and the periphery of the gene regulatory network in B-cell lymphoma.** BMC Systems Biology. 2012 touko 14;6: 38. <https://doi.org/10.1186/1752-0509-6-38>

Mueller LAJ, Kugler KG, Graber A, Emmert-Streib F, Dehmer M. **Structural Measures for Network Biology Using QuACN.** BMC Bioinformatics. 2011 joulu 24;12(1). 492. <https://doi.org/10.1186/1471-2105-12-492>

Altay G, Emmert-Streib F. **Inferring the conservative causal core of gene regulatory networks.** BMC Systems Biology. 2010 syys 28;4: 132. <https://doi.org/10.1186/1752-0509-4-132>

Emmert-Streib F, Dehmer M. **Hierarchical coordination of periodic genes in the cell cycle of *Saccharomyces cerevisiae*.** BMC Systems Biology. 2009 heinä 20;3: 76. <https://doi.org/10.1186/1752-0509-3-76>

Emmert-Streib F, Dehmer M. **Information processing in the transcriptional regulatory network of yeast: Functional robustness.** BMC Systems Biology. 2009 maalisk 19;3: 35. <https://doi.org/10.1186/1752-0509-3-35>

Dehmer M, Emmert-Streib F. **Structural information content of networks: Graph entropy based on local vertex functionals.** Computational Biology and Chemistry. 2008 huhti;32(2):131-138. <https://doi.org/10.1016/j.compbiolchem.2007.09.007>

Emmert-Streib F, Mushegian A. **A topological algorithm for identification of structural domains of proteins.** BMC Bioinformatics. 2007 heinä 3;8. 237. <https://doi.org/10.1186/1471-2105-8-237>