



Center for Computational Biology and Bioinformatics (CCBB) 2022

CCBB publications (2021 onwards):

1. Krüppel-like factor-4 and Krüppel-like factor-2 are important regulators of joint tissue cells and protect against tissue destruction and inflammation in osteoarthritis: Kawata M, Teramura T, Ordoukhanian P, Head SR, **Natarajan P**, **Sundaresan A**, Olmer M, Asahara H, Lotz MK. Ann Rheum Dis. 2022 May 9:annrheumdis-2021-221867. doi: 10.1136/annrheumdis-2021-221867. Online ahead of print. PMID: 35534137 DOI: [10.1136/annrheumdis-2021-221867](https://doi.org/10.1136/annrheumdis-2021-221867)
2. Maturation Delay of Human GABAergic Neurogenesis in Fragile X Syndrome Pluripotent Stem Cells: Ai Zhang, Irina Sokolova, **Alain Domissy**, Joshua Davis, Lee Rao, Kagistia Hana Utami, Yanling Wang, Randi J Hagerman, Mahmoud A Pouladi, Pietro Sanna, Michael J Boland, Jeanne F Loring. Stem Cells Translational Medicine, Volume 11, Issue 6, June 2022, Pages 613–629, <https://doi.org/10.1093/stcltm/szac022>
3. Ethanol withdrawal-induced adaptations in prefrontal corticotropin releasing factor receptor 1-expressing neurons regulate anxiety and conditioned rewarding effects of ethanol: Patel RR, Wolfe SA, Borgonetti V, Gandhi PJ, Rodriguez L, Snyder AE, D'Ambrosio S, Bajo M, **Domissy A**, Head S, Contet C, Dayne Mayfield R, Roberts AJ, Roberto M. Mol Psychiatry (2022). <https://doi.org/10.1038/s41380-022-01642-3>.
4. A non-synonymous SNP in SIRT6 predicts neurological severity in Friedreich ataxia Layne N Rodden, Christian Rummey, Yi Na Dong, Sarah Lagedrost, Sean Regner, Alicia Brocht, Khalaf Bushara, Martin B Delatycki, Christopher M Gomez, Katherine Mathews, Sarah Murray, Susan L Perlman, Bernard Ravina, S H Subramony, George Wilmot, Theresa Zesiewicz, Alessandra Bolotta, **Alain Domissy**, Christine Jespersen, Baohu Ji, Elisabetta Soragni, Joel M. Gottesfeld and David R Lynch; Frontiers in Molecular Biosciences (2022) Pending
5. Integrative scRNA-seq analyses of human articular cartilage and meniscus reveal a pathogenic, senescent subpopulation that is expanded in OA, shared between both tissues, and has critical roles in extracellular matrix properties and tenascin signaling: Hannah Swahn, Tomas Duffy, Kun Li, Tony Mondala, **Padmaja Natarajan**, Steven R. Head and Martin K. Lotz; An abstract submitted to OARSI 2022

List of publications that acknowledged CCBB (2021 onwards):

1. Cleavage of DNA and RNA by PLD3 and PLD4 limits autoinflammatory triggering by multiple sensors. Gavin AL, Huang D, Blane TR, Thinnies TC, Murakami Y, Fukui R, Miyake K, Nemazee D. *Nat Commun.* 2021 Oct 7;12(1):5874. doi: 10.1038/s41467-021-26150-w. PMID: 34620855
2. Regulation of ex-translational activities is the primary function of the multi-tRNA synthetase complex. Cui H, Kapur M, Diedrich JK, Yates JR, Ackerman SL, Schimmel P. *Nucleic Acids Res.* 2021 Apr 19;49(7):3603-3616. doi: 10.1093/nar/gkaa1183. PMID: 33341895