

האוניברסיטה העברית - הפקולטה לחקלאות המכון לביוכימיה, מדעי המזון והתזונה



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הנושא:

Single molecule techniques for studying gene expression in intact mammalian tissues.

המפגש יתקיים 9:00 אוקטובר 2013, בשעה 20 ביום א', 20 אוקטובר במועדון הסגל במועדון הסגל

Abstract:

Mammalian tissues are composed of heterogenous cells operating in structured micro environments, which are often spatially polarised by morphogens gradients or blood flow. To understand how cells jointly operate within the tissue context there is a critical need to develop quantitative techniques to measure gene expression within the intact tissue. I will describe novel methodologies, based on single molecule fluorescence in-situ hybridisation, which enable us to count individual mRNA of any gene of interest, measure gene promoter states and quantify mRNA degradation rates in intact mammalian tissues. I will describe applications of these approaches to the analysis of the mouse intestine - a model system for tissue stem cells.