

# 2018 RNA Biology meeting in memory of Prof. Yossi Sperling

At the Nanotechnology Auditorium (Building 206), Bar-Ilan University

October 8, 2018

08:30-09:00 Registration, coffee

09:00-09:15 Greetings: Prof. Shulamit Michaeli, Vice-president of Research

09:15-09:55 Keynote: **Prof. Reinhard Lührmann**

Max Planck Institute for Biophysical Chemistry, Göttingen

**Novel mechanistic insights into the inner workings of the human spliceosome by combined biochemical and Cryo-EM studies**

Session 1: Chair – Schragi Schwartz, Weizmann Institute

10:00-10:12 Igor Ulitsky, Weizmann Institute

Determinants of nuclear enrichment of long RNAs in human cells

10:15-10:27 Noam Shomron, Tel-Aviv University

MicroRNA-mRNA splicing crosstalk

10:30-10:42 Maayan Salton, Hebrew University

Promoting alternative splicing

10:45-11:25 [Coffee Break](#)

11:25-11:37 Tal Shay, Ben-Gurion University

Splicing bias at the single cell level

11:40-11:52 Shalev Itzkovitz, Weizmann Institute

Single molecule transcript imaging in the intact pancreas

11:55-12:07 Carmity Levy, Tel-Aviv University

New regulators of miRNAs biogenesis

12:10-12:50 Keynote: **Prof. Dónal O'Carroll**

MRC Centre for Regenerative Medicine, The University of Edinburgh

**RNA modification in development and disease**

12:50-13:50 [Lunch + Poster session](#)

**Session 2:** Chair – Yoav Arava, Technion

- 13:55-14:07 Erez Levanon, Bar-Ilan University  
Physiological impact of A-to-I RNA editing: from cardiovascular diseases to autoimmunity
- 14:10-14:22 Yael Mandel-Gutfreund, Technion  
Unexpected Transcription Factor-RNA interactions in Human Pluripotent Cells
- 14:25-14:37 Raymond Kaempfer, Hebrew University  
Pending their position within the gene, short RNA elements that activate PKR potently enhance splicing or silence translation by inducing eIF2 $\alpha$  phosphorylation
- 14:40-14:52 Rotem Karni, Hebrew University  
Dysregulation of alternative splicing in cancer and its modulation as therapy
- 14:55-15:07 Shulamit Michaeli, Bar-Ilan University  
Death and social motility in trypanosomes are controlled by splicing
- 15:10-15:50 [Coffee Break](#)

**Session 3:**

- 15:50-16:55 Flash Talks (4 min each)
- 17:00-17:12 Eran Hornstein, Weizmann Institute  
Composition of membraneless organelles uncovered by APEX proximity labeling
- 17:15-17:27 Yaron Shav-Tal, Bar-Ilan University  
Nuclear speckles can buffer the availability of splicing factors in the nucleoplasm to regulate rates of gene expression
- 17:30-17:42 Ruth Sperling, Hebrew University  
Novel function of the endogenous spliceosome - the supraspliceosome
- 17:45 [Concluding Remarks: Gil Ast, Tel-Aviv University](#)

## Flash Talks

- 15:50-15:53 [Luna Tammer \(TAU\)](#) - Exon-Intron Architecture in Genes Located in High and Low GC-Content Affects Alternative Splicing
- 15:54-15:57 [Aldema Sas-Chen \(WIS\)](#) - Paired-cell sequencing enables spatial gene expression mapping of liver endothelial cells
- 15:58-16:01 [Noa Ben-Asher \(TECH\)](#) - Atdr-1 is a novel anti-sense regulator of *adr-1* in *C. elegans*
- 16:02-16:05 [Ruti Balter \(TAU\)](#) - Quantifying Proteome diversification due to A-to-I RNA editing in squids' brain
- 16:06-16:09 [Eli Kopel \(BIU\)](#) - Decreased A-to-I RNA editing as a source of keratinocytes dsRNA in psoriasis
- 16:10-16:13 [Dikla Kamus Elimeleh \(BGU\)](#) - Analysis of transcripts that associate with LeishIF4E1 – an intriguing cap-binding protein in Leishmania
- 16:14-16:17 [Maya Polishchuk \(TECH\)](#) - SMARTIV: Web server for combined sequence and structure de-novo RNA motif discovery
- 16:18-16:21 [Tanaya Bose \(WIS\)](#) - Glimpse into origin of life: Role of RNA
- 16:22-16:25 [Mai Baker \(HUJI\)](#) - KDM3A regulates alternative splicing of cell cycle genes following DNA damage
- 16:26-16:29 [Binyamin Zuckerman \(WIS\)](#) - NXF1 availability regulates export of inefficiently spliced, long and intronless RNAs
- 16:30-16:33 [Pushkar Malakar \(HUJI\)](#) - Long Noncoding RNA MALAT1 regulates cancer glucose metabolism by enhancing mTOR-mediated TCF7L2 translation
- 16:34-16:37 [Lior Lasman \(WIS\)](#) - Genetic Dissection of m6A RNA Methylation Role in Early Mammalian Development
- 16:38-16:41 [Shani Gal-Oz \(BGU\)](#) - Female Baseline Alertness may Underlie Sexual Dimorphism in the Immune System
- 16:42-16:45 [Keren Bahar Halpern \(WIS\)](#) - Paired-cell sequencing enables spatial gene expression mapping of liver endothelial cells
- 16:46-16:49 [Amalie Grenov \(WIS\)](#) - YTHDF proteins regulate germinal center B cell function
- 16:50-16:53 [Arie Fridrich \(HU\)](#) - Evolution and functional characterization of Argonaute proteins in the starlet sea anemone *Nematostella vectensis*