

Wednesday, June 25, 2025

10:00am–2:30pm	Registration Albert Sherman Center (ASC) Lobby
1:00–2:30pm	Career Workshop Paul J. DiMare Center Conference Room <i>Sponsored by Lathrop GPM (Pre-registration required)</i>
2:40–2:45pm	Welcome and Introduction, Phillip D. Zamore , HHMI, RTI, UMass Chan Medical School ASC2.2102 Auditorium and Online
2:45–3:30pm	Regulation of exogenous RNAs: From viral RNAs to mRNA therapeutics Keynote: V. Narry Kim , Seoul National University
3:40–4:15pm	Poster Flash Talks and Exhibit Hall ASC2.2102 Auditorium and Online <i>Session Chair: Theodore Carrigan-Broda, RTI, UMass Chan</i>
4:15–6:00pm	RNATx Kickoff & Welcome Reception Paul J. DiMare Center 1st and 2nd Floor Foyer Areas and 2nd Floor Terrace

Thursday, June 26, 2025

7:45–8:50am	Registration and Continental Breakfast , <i>sponsored by Ainylam</i> ASC Lobby and Multipurpose Room
8:50–8:55am	Welcome and Introduction, Phillip D. Zamore , <i>HHMI, RTI, UMass Chan Medical School</i>
	Session I: The long and the short of ncRNAs ASC2.2102 Auditorium and Online <i>Session Chairs: Samantha Ho & Haoyang Cheng, RTI, UMass Chan</i>
8:55–9:20am	MicroRNA-mediated gene regulation in animal development Victor Ambros , <i>UMass Chan Medical School</i>
9:25–9:50am	Conserved roles of miRNAs in development Luisa Cochella , <i>Johns Hopkins School of Medicine</i>
9:55–10:20am	Investigating the structure-function relationships of noncoding RNAs Alisha “Jonesy” Jones , <i>New York University</i>
10:25–10:35am	Evidence for Mutator component-independent piRNA silencing in <i>C. elegans</i> Wendy Tan , <i>RTI, UMass Chan Medical School</i>
ON DEMAND	Short Talks
10:40–11:10am	Networking & Coffee Break Medical School Lobbies, <i>Sponsored by AbbVie</i>
	Session II: RNA Structure and Mechanism ASC2.2102 Auditorium and Online <i>Session Chairs: William Cruz & Min Zhang, RTI, UMass Chan</i>
11:15–11:40am	From noise to signal: studying the efficiency of mRNA splicing Athma Pai , <i>RTI, UMass Chan Medical School</i>
11:45–12:10pm	tRNA modifications & codon-biased translation in cancer Richard I. Gregory , <i>UMass Chan Medical School</i>
12:15–12:25pm	Cell surface glycoRNA biology Ryan Flynn , <i>Boston Children’s Hospital, Harvard Medical School</i>
12:30–12:40pm	Uncovering the postfertilization regulatory mechanisms required for intergenerational epigenetic inheritance in mice Grace Lee , <i>University of Pennsylvania</i>
12:45–1:45pm	Lunch ASC Multipurpose Room (MPR), <i>sponsored by Alloy Therapeutics</i>
1:45–3:30pm	Poster Session I (Even Posters) <i>sponsored by ChemGenes & Exhibit Hall</i> Medical School Lobbies & Online
	Session III: RNA Technologies ASC2.2102 Auditorium and Online <i>Session Chairs: Marina Krykbaeva & Valeria Sanabria, RTI, UMass Chan</i>
3:30–3:55pm	Cross-kingdom RNA communication & RNA-based innovative strategies for crop-protection Hailing Jin , <i>UC Riverside</i>
4:00–4:25pm	Ancient RNA - Possibilities and Limitations Marc Friedländer , <i>Stockholm University</i>
4:30–4:40pm	irCLIP-RNP and Re-CLIP reveal patterns of dynamic protein assemblies on RNA Luca Ducoli , <i>Stanford University</i>
4:45–4:55pm	Mime-seq 2.0: Cell-specific sequencing of microRNAs from mammalian tissues and organs Ariane Mandlbauer , <i>Johns Hopkins University</i>
5:00–5:10pm	Deep generative models generate mRNA sequences with enhanced translational capacity and stability He Zhang , <i>Raina Biosciences</i>
6:00pm	2025 RNATx Party at the Top of the Tower , ticket required <i>Sponsored by ChemGenes</i>

Friday, June 27, 2025

7:45–8:45am	Registration and Continental Breakfast <i>sponsored by City Therapeutics</i> ASC Lobby and MPR
	Session IV: ASOs, Delivery, and Cancer Therapeutics ASC2.2102 <i>Session Chairs: Thomas Ormsby & Matt Yee, RTI, UMass Chan</i>
8:45–9:10am	Development of SORT lipid nanoparticles (LNPs) for genome correction of disease-causing mutations Daniel J. Siegwart , <i>UT Southwestern</i>
9:15–9:40am	Gain and Loss of RBP Functions a Cancer-Associated Mutation Daniel Dominguez , <i>UNC School of Medicine</i>
9:40–9:50am	Mirror-image Nucleic Acids as Advanced Molecular Therapies Wen Zhang , <i>Indiana University School of Medicine</i>
9:55–10:20am	The Basic and Applied Biology of Exosomes in Cancer Raghu Kalluri , <i>MD Anderson Cancer Center</i>
10:20–10:50am	Networking and Coffee Break <i>sponsored by CAMP4</i> Medical School Lobbies
	Session V: Editing ASC2.2102 <i>Session Chairs: Anis Barati & Daniel MacVeigh-Fierro, RTI, UMass Chan</i>
10:55–11:20am	Development and Characterization of Precision Genome Editing Tools Alexis Komor , <i>University of California, Berkeley</i>
11:25–11:35am	Applying AIMER-based RNA editing technology to nonsense mutation correction in the CNS and lung Genliang Lu , <i>Wave Life Sciences</i>
11:40–11:50am	Prime editing-mediated conversion of an endogenous tRNA gene into a suppressor tRNA for disease-agnostic therapeutic genome editing Sarah Pierce , <i>Broad Institute</i>
11:55–12:05pm	Mechanistic insights into CRISPR-associated transposons and implications for programmable gene insertion Leifu Chang , <i>Purdue University</i>
12:10–12:20pm	Developing bespoke gene editing treatments for patients with carbamoyl phosphate synthetase 1 (CPS1) deficiency in real time: successes and challenges Xiao Wang , <i>University of Pennsylvania</i>
ON DEMAND	Short Talks
12:25–1:15pm	Lunch , <i>sponsored by Eli Lilly & Co.</i> ASC Multipurpose Room (MPR)
1:15–2:45pm	Poster Session II (Odd Posters) , <i>sponsored by ChemGenes and Exhibit Hall</i> Medical School Lobbies
	Session VI: Translating Discoveries ASC2.2102 <i>Session Chairs: Annie Collins & Emily Knox, RTI, UMass Chan</i>
2:45–3:10pm	Receptor Mediated Targeted Delivery to Proximal Tubules in Kidney Alfica Sehgal , <i>Judo Bio</i>
3:15–3:25pm	MicroRNA-21 is a Potential Therapeutic Agent Targeting Tgfb1 and Mitigating High-Fat-Diet-Induced Liver Disease and Cancer Urmila Jagtap , <i>Beth Israel Deaconess Medical Center, Harvard Medical School</i>
3:30–3:55pm	Cancer genes beyond chromosomes Howard Chang , <i>Amgen</i>
4:00–4:10pm	Advancing an intrathecal divalent siRNA for prion disease as an investigator-initiated program Eric Vallabh Minikel , <i>Broad Institute</i>
4:15–4:25pm	RSwitch-enabled Gene Therapy to Fine Tune Frataxin Expression for the Treatment of Friedrich's Ataxia Jon Dempersmier , <i>Rgenta Therapeutics</i>
4:30–4:40pm	Unlocking the Full potential of RNAi therapeutics with LEAD™ Chunyang Zhang , <i>Sanogene Bio</i>
4:45–5:30pm	Biomimetic Chemistry of RNA Therapeutics Keynote: Mano Manoharan , <i>Alnylam Pharmaceuticals</i>
5:35pm	Closing Remarks, Awards, and THANK YOU!