

MEMORY DOGMAS REEXAMINED

May 23, 2023 - NYU, CNS 4 Washington Place, NYC, NY
Lecture Hall: Meyer 121

9 - 9:10

Introduction

Yadin Dudai

9:10-11:15

Session 1: Models of Memory

Chair and Moderator: Cristina Alberini

Speakers

1. Kelsey Martin (Simons Foundation) Cell biology of synaptic plasticity: conserved mechanisms in memory
2. Tom Carew (NYU) Growth factors provide a molecular platform for pattern detection in memory formation in *Aplysia*
3. Eric Klann (NYU) The dogma of protein synthesis in memory consolidation
4. Cristina Savin (NYU) Using memory models to bridge experimental observations across scales

BREAK

11:30-1:30

Session 2: Searching for the engram: Is it there at all?

Chair and Moderator: Yadin Dudai (NYU/Weizmann)

Speakers

1. Denise Cai (Mt. Sinai) The brain in motion: stability and flexibility of memory engrams across time and experience
2. André Fenton (NYU) Who's in charge? Optogenetic stimulation elicits internally-generated discharge and memory
3. Lila Davachi (Columbia) The details matter: tracking dynamic changes in the 'engram' during and after event coding
4. Alex Williams (NYU) Remapping and drift of network representations in unchanging environments

1:30-2:30

Lunch on 6th floor

2:30-4:30

Session 3: Memories are made of these

Chair and Moderator: Gyorgy Buzsaki

Speakers

1. Joseph LeDoux (NYU) Without Memory there would be no mind
2. Todd Sacktor (SUNY) Memory and Thesus' Ship: Continual KIBRA-PKM ζ interactions maintain LTP and long-term memory
3. Shane Liddelow: (NYU) The Astrocyte Strikes Back: How Glial Cells Influence Memory Formation
4. Jayeeta Basu (NYU) Memory demand reduces representational drift to stabilize learned place maps

4:30-5:00

Session 4: Synthesis

Discussants

Cristina Alberini, Gyorgy Buzsaki, Yadin Dudai, André Fenton

Refreshments on 6th floor 5:00-6:00