האוניברסיטה העברית בירושלים THE HEBREW UNIVERSITY OF JERUSALEM



The Hebrew University of Jerusalem

Syllabus

Research Methods in Computational Biology - 76556

Last update 10-08-2023

HU Credits: 2

Degree/Cycle: 1st degree (Bachelor)

Responsible Department: Computer Science & Computational Biology

Academic year: 0

Semester: 2nd Semester

<u>Teaching Languages:</u> Hebrew

Campus: E. Safra

Course/Module Coordinator: Prof. Tommy Kaplan

Coordinator Email: tommy@cs.huji.ac.il

Coordinator Office Hours: Upon request

Teaching Staff:

Prof Michal Linial, Prof Tommy Kaplan, Prof Dina Schneidman

<u>Course/Module description:</u> 2nd year seminar in Computational Biology

<u>Course/Module aims:</u> Review of different topics in computational biology.

<u>Learning outcomes - On successful completion of this module, students should be</u> <u>able to:</u> Manuscripts, Visualizations, Methods, Critical thinking, Abstract, Presentation

<u>Attendance requirements(%):</u> 100\$

Teaching arrangement and method of instruction: Frontal

Course/Module Content: Comparative Genomics Enhancers 3D genomics Single-cell RNA-seq Systems Biology The microbiome Protein structure Protein structure Protein-protein interactions RNA dynamics Microbial genomics Human diseases

<u>Required Reading:</u> NA

Additional Reading Material:

<u>Grading Scheme:</u> Presentation / Poster Presentation / Lecture/ Seminar / Pro-seminar / Research proposal 100 %

Additional information: