

# SAMUEL MEYER FRIEDMAN

sam@sameyer.com · New York, NY 10025

## EDUCATION

---

**Rutgers University**, School of Arts and Sciences Honors Program  
**BA in Genetics**, Certificate in Computational Genetics, *Summa Cum Laude*  
Courses: Java, Data Structures, Bioinformatics (Python), Comp. Genetics (R)

**New Brunswick, NJ**  
**May 2021**

## PROFESSIONAL EXPERIENCE

---

### HUMAN GENETICS INSTITUTE OF NEW JERSEY

**Piscataway, NJ**

**Curation Assistant**, National Institute of Mental Health Repository & Genomics Resource (NRGR) **Jun 2021-Present**

- Use Python (Pandas) to curate, harmonize, and validate terabytes of data in a multimillion-dollar genetics repository.
- Build pipelines to scrape XML data from sister repositories and construct inter-repo. ID mapping files using Python.
- Develop Python scripts to corroborate that genetic profiles of 50K+ biosamples match IDs from clinical interviews.
- Assessing sample risk burden for manifestation of psychosis by computing polygenic risk scores using R and Python.
- Digitized and indexed dozens of documents containing confidential information using optical character recognition.

**Research Assistant** to Linda Brzustowicz, M.D., Distinguished Professor/NRGR Director

**Sep 2018-May 2021**

- Independent Honors thesis project: identified gene associated with increased risk for manifestation of Bipolar Disorder.
- Awarded Henry Rutgers Scholar Award for “outstanding” Honors thesis and Department of Genetics Award for Excellence in a Research Presentation to recognize “extraordinary” communication of research project.
- Developed Python scripts that added additional checks to the quality control process for new NRGR data submissions.

**Aresty Summer Science Fellow** to Amrik Sahota, Ph.D., Research Professor

**Jun 2018-Aug 2018**

- Began the pre-clinical trial for a novel therapeutic oral treatment for Cystinuria, a debilitating genetic disorder.
- Assessed drug for cardiac, renal, and hepatic toxicity on mice as a model for its metabolic activity in humans using the following methods: PCR, gel-electrophoresis, enzyme-linked immunosorbent assays, spectrophotometry, and Excel.

### TENAFLY PSYCHIATRIC ASSOCIATES

**Tenafly, NJ**

**Administrative Associate (Seasonal – Summers and Winter Breaks)**

**Jun 2017-Jun 2021**

- Used Python to construct tool that gives insights into historical billing data upon entry of parameters, e.g. billing codes.
- Decreased office spending by 8% (\$43K p.a.) and increased productivity through rote task automation using Python.
- Served as a liaison to facilities, ran payrolls, managed ledgers and QuickBooks, launched HIPAA-compliant server.

## EXTRACURRICULAR ACTIVITIES

---

### YACHAD, THE NATIONAL JEWISH COUNCIL FOR DISABILITIES

**Brooklyn, NY**

**Coordinator**

**Sep 2021-Present**

- Develop and facilitate activities for 150 members and advisors, foster community building, and attend to any issues.

### ARESTY RESEARCH CENTER

**New Brunswick, NJ**

**Senior Peer Instructor**

**Sep 2020-Aug 2021**

- Developed curriculum, hosted talks and events, and mentored 40 Peer Instructors through the facilitation of seminars.
- Moderated the 17<sup>th</sup> Annual Summer Science Symposium, in which over 200 individuals were in attendance.

**Peer Instructor**

**Sep 2019-May 2020**

- Mentored and taught students to write concise abstracts, design concise posters, and engage non-expert audiences.

### THE EXAMINER

**New Brunswick, NJ**

**Editor-in-Chief and President**

**Sep 2019-May 2021**

- Managed and presided over editorial and layout staff and journalists at Rutgers’ 60-member science periodical.
- Facilitated and lead discussions on peer-reviewed publications, invited and moderated faculty and guest speakers.
- Tripled the club’s funding as treasurer (2018) by advocating for and clarifying the club’s missions and new initiatives.

## SKILLS

---

**Software:** Python, R, Java, HTML, CSS, Unix scripting, SQL, Git, Excel.

**Languages:** Fluent in Hebrew (speak, read, write).