# FRIEDMAN FAMILY VISITING PROFESIONALS PROGRAM





Visit to University of California San Diego: April 24th and 25th, 2023.

This report summarizes the visit of **Ezra Jampole** from Exponent that took place at the University of California San Diego on April 24<sup>th</sup> and 25<sup>th</sup>, 2023,

## ITINERARY OR AGENDA

The itinerary for April 24th was the following:

TIME:	ACTIVITY:
9:00 AM – 9:30 AM	Student Chapter Team meets, welcomes, and transports Ezra Jampole to campus.
9:30 AM – 12:00 PM	Tour to the NHERI Large High Performance Outdoor Shake Table.
12:00 PM – 1:00 PM	Lunch with faculty and EERI student board.
1:00 PM - 2:30 PM	Tour to the Charles Lee Powell Lab and the Caltrans Seismic Response Modification Device (SRMD) Test facility.
4:00 PM – 5:30 PM	Guest Lecture: Earthquake Engineering Gone Wrong: Legal and Insurance Disputes.
5:30 PM - 7:00 PM	Networking reception at local restaurant.

The itinerary for April 25<sup>th</sup> was the following:

TIME:	ACTIVITY:
9:00 AM – 9:30 AM	Student Chapter Team meets and transports Ezra Jampole to campus.
9:00 AM – 11:00 AM	Informal meeting with graduate students where they present, share and discuss research projects to get insight and feedback from Ezra Jampole.
11:00 PM - 11:30 PM	Farewell and transportation of Ezra Jampole to Hotel.

## STUDENT CHAPTER VISIT PLANNING COMMITTEE

#### LEAD ORGANIZER(S):

- Axel Yarahuaman-Chamorro, President, ayarahua@ucsd.edu
- Kyoungyeon Lee, Vicepresident, kyl008@ucsd.edu
- Franco Mayorga, Seminar Director, cfmayorg@ucsd.edu
- Kaixin Chen, Social Media Director, kac011@ucsd.edu
- Claudio Sepúlveda, Counselor, csepulve@eng.ucsd.edu
- Guofeng Qian, Treasurer, g4qian@eng.ucsd.edu
- Louis Lin, Seismic Design Competition Mentor, Iolin@ucsd.edu
- Dr. Gilberto Mosqueda, UCSD EERI Faculty Advisor, gmosqueda@ucsd.edu

#### VISITING PROFESSIONAL LECTURE OVERVIEW

#### Lecture Abstract

In an ideal world, an engineer's involvement in a structure would end after construction is finished. But the reality is that many structures are subject to costly litigation or arbitration because of allegations of inadequate design or performance. Additionally, when a structure is subjected to extreme loading such as from an earthquake, insurance disputes arise regarding the source of damage and if the damage was caused by the earthquake, and who is responsible. This talk will review the types of legal disputes that structural engineers can find themselves in and how expert witnesses are used to sort through the issues and provide independent opinions. Several case studies on earthquake engineering disputes will be discussed, including: alleged reduction in the earthquake-resisting capacity of a building because of water intrusion; distinguishing between damage caused by earthquakes and caused by other actions following a large earthquake, the alleged insufficient earthquake resistant design of transportation infrastructure in a high-seismic zone, the safety of a bridge with seismic design errors, and more.

#### Professional Bio

Dr. Ezra Jampole visits UCSD as part of the Earthquake Engineering Research Institute (EERI) Friedman Family Visiting Professionals Program. Dr. Jampole is a Senior Managing Engineer at Exponent in New York City. He specializes in risk analysis and performance of structures subjected to extreme loads such as earthquakes, wind, and flood events. He has served as a consultant on projects assessing the origin of damage to structures following natural disasters, adjacent construction incidents, corrosion and deterioration, settlement, and long-term issues.

#### SUPPLEMENTAL ACTIVITES

Guest Lecture: Earthquake Engineering Gone Wrong: Legal and Insurance Disputes

The lecture given by Dr. Jampole was a remarkable success with more than 40 in-person attendees between undergraduate students, graduate students, faculty, San Diego State University students and faculty, and member of the EERI San Diego Regional Chapter. This lecture was also part of the class SE 290 Structural Engineering Seminar which has several graduate students enrolled.

Dr. Jampole conducted an interactive lecture where he showed photos of actual failure investigations, and the attendees were questioned about the failure mechanism of several cases. This exercise resulted in the active participation of the attendees and meaningful feedback from the lecturer. At the end of the session, further discussion about the lecture resulted due to questions asked by the attendees.



Informal meeting with graduate students where they present, share and discuss research projects to get insight and feedback from Ezra Jampole.

This meeting was an opportunity for graduate students to share their research and receive feedback from Dr. Jampole in a very exclusive and personal space. Breakfast consisting of coffee and pastries was provided to the attendees. Dr. Jampole also shared insights into multiple projects he is working on at Exponent. He also was able to share details about the typical day of a structural engineer working in a company like Exponent. Finally, Dr. Jampole gave advice about how students can find a future career at Exponent.

#### Networking reception at local restaurant

The networking reception consisted in providing an exclusive space to the speaker and the attendees of the lecture where they could interact while enjoying free food and drinks. This reception occurred immediately after the main lecture and took place in an on-campus restaurant, therefore, more than 40 people were able to participate.

#### RESULTS, FEEDBACK AND LESSONS LEARNED

- General: The visit of Dr. Jampole was a meaningful and successful full event at the Structural Engineering department at UC San Diego. The multiple events were able to gather more than 50 people consisting of undergraduate students, graduate students, faculty, San Diego State University students and faculty, and member of the EERI San Diego Regional Chapter.
- Funding challenges: The University of California San Diego EERI Student Chapter did not have funds
  before the event. The funds to conduct the event came from the Structural Engineering Department at
  UC San Diego and the EERI San Diego Regional Chapter. Our team learned the valuable lesson that
  having our own funds would have provided us with more independence and versatility when organizing
  the event. Our team is currently working in fundraisers and other ways to get financial support.

- Attendees challenges: the University of California San Diego is known to be a very demanding school. Moreover, most graduate students are required to attend once or twice seminars per week. Therefore, students can be reluctant to spend their time in an extra seminar during the week. Our team decided to approach this problem using several strategies: (1) Making the event part of the SE 290 class so enrolled students would be more willing to attend, (2) Extensive use of our social media platforms to announce the event, and (3) Offering free food and drinks after the event. The results were more than 50 in-person attendees during the entire visit.
- Future visits: Our team would like to continue being part of the Friedman Family Visit Program. We would
  like to experience lectures on topics such as Earthquake Reconnaissance, Hybrid simulation, Seismic
  mitigation devices, and Geotechnical seismic isolation.

# **ACKNOWLEDGEMENTS**

The University of California EERI Student Chapter gratefully acknowledges the support of the Friedman Family for sponsoring the travel of Ezra Jampole through their Friedman Family Visiting Professional Program endowment. The University of California EERI Student Chapter is also thankful to the Structural Engineering Department at UC San Diego and the EERI San Diego Regional Chapter for the financial support. Finally, The University of California EERI Student Chapter recognizes the impactful guidance that Dr. Jampole provided to the students during their visit.

# LIST OF ATTACHMENTS

Supplement attachments.









# EERI Friedman Family Visiting Professional Lecture

# Earthquake Engineering Gone Wrong: Legal and Insurance Disputes

#### Abstract:

In an ideal world, an engineer's involvement in a structure would end after construction is finished. But the reality is that many structures are subject to costly litigation or arbitration because of allegations of inadequate design or performance. Additionally, when a structure is subjected to extreme loading such as from an earthquake, insurance disputes arise regarding the source of damage and if the damage was caused by the earthquake, and who is responsible. This talk will review the types of legal disputes that structural engineers can find themselves in and how expert witnesses are used to sorting through the issues and provide independent opinions. Several case studies on earthquake engineering disputes will be discussed, including the alleged reduction in the earthquake-resisting capacity of a building because of water intrusion; distinguishing between damage caused by earthquakes and caused by other actions following a large earthquake, the alleged insufficient earthquake-resistant design of transportation infrastructure in a high-seismic zone, the safety of a bridge with seismic design errors, and more.

#### Speaker:



### Ezra Jampole, Ph.D., P.E. (Exponent)

Dr. Jampole is a Senior Managing Engineer at Exponent in New York City. He specializes in risk analysis and performance of structures subjected to extreme loads such as earthquakes, wind, and flood events. He has served as a consultant on projects assessing the origin of damage to structures following natural disasters, adjacent construction incidents, corrosion and deterioration, settlement, and long-term issues. Dr. Ezra Jampole visits UCSD as part of the Earthquake Engineering Research Institute (EERI) Friedman Family Visiting Professionals Program.

Date and Time: April 24th, 4:00 PM

Venue: SME 248, University of California San Diego

Agenda:

4:00 PM - 5:30 PM Main Presentation

5:30 PM - 6:30 PM Networking reception (food will be provided)

Students, professionals, and academics are all welcome to join the lecture.

If you have any questions, please email eeri@ucsd.edu. For event updates, please visit eeri.ucsd.edu.

Photo of President Axel Yarahuaman introducing guest lecture



• Photo of part of the UC San Diego EERI Student Chapter, Dr. Joel Conte, and Dr. Ezra Jampole at NHERI Large High Performance Outdoor Shake Table

