### **Education and Community Outreach Committee May 17, 2022 – 12:00 pm Central Time via TEAMS**

- Attendance Laura Lowes (University of Washington—RAPID), Chad Kusko (Lehigh University—RTMD), Tricia Clayton (Wake Forest University—UT Mobile Shakers), Erik Salna (Florida International University— The Wall of Wind), Stephanie Paal (Texas A&M University— User Forum), Matt Schoettler (University of California, Berkeley—SimCenter), Karissa Alarcon (University of California, Davis—CGM), Karina Vielma (University of Texas at San Antonio—NCO)
- ACTION ITEM: April ECO Meeting Minutes approved

#### ECO Updates

- NHERI ECO hosted two panels at 2022 ACWE: REU Panel & NHERI GSC Panel. Both REU and NHERI GSC members presented research. NHERI GSC members also shared their experience applying and attending graduate school. NHERI GSC also shared an overview of the organization, its leaders, its purpose, its upcoming events, and how to join. Finally, five natural hazards researchers shared their expertise on navigating pathways into academia.
- o Please send any NHERI news stories to NCO Communications, Marti or Cheryl Ann.

#### NHERI Summer Institute

#### **Important Dates**

- June 1, 2022, NHERI Presenter/Representative registration deadline
  - ACTION ITEM: Share short bio and headshot by May 1st.
  - ACTION ITEM: Register as NHERI representative for the Summer Institute by June 1st: <a href="https://bit.ly/2022NHERI\_SIPresenter">https://bit.ly/2022NHERI\_SIPresenter</a>
  - ACTION ITEM: Register for the river cruise excursion and share dietary restrictions ASAP: <a href="https://bit.ly/2022NHERI\_SummerInstituteRegistration">https://bit.ly/2022NHERI\_SummerInstituteRegistration</a>.
  - o ACTION ITEM: Submit Lesson Plan and PPT by June 1st
- June 20-22, 2022, Summer Institute: Table Updated 5/25/2022

Julie 20-22,	Julie 20-22, 2022, Sulfillier institute. Table Opuated 3/23/2022								
	NHE	RI Sum	mer Institut	e Site Re	eprese	ntatives			
Site	Representative	Reg.	River Cruise	Diet	Bio	Headshot	Flyer	Lesson Plan 5/31	PPT 5/31
FIU, WOW	Amal Elawady	Υ	N	N	Υ	Υ	Υ	N	N
Lehigh, RTMD	Jim Ricles Liang Cao	Y	Y Y	Y None	Y Y	Y Y	N	N	N
OSU, HWRL	Pedro Lomonaco	Υ	Υ	None	Υ	Υ	Υ	N	N
SimCenter	Laura Lowes	Υ	NTY	None	Υ	Υ	Υ	N	N
UC Davis, CGM	Ross Boulanger or Karissa	N	N	N	N	Υ	N	N	N
UCSD, LHPOST	Koorosh Lotfizadeh Joel Conte	Y	NTY Y, G	None None	Y	Y	Υ	N	N
CONVERGE	Melissa Villarreal	Υ	Υ	None	Υ	Υ	Υ	N	N
UF-BLWT	Jennifer Bridge	Υ	NTY	None	Υ	Υ	Υ	Υ	N
UT-FMS	Tricia Clayton	Υ	NTY	None	Υ	Υ	Υ	Υ	N
UT-DesignSafe	Tim Cockerill	Υ	Υ	None	Υ	Υ	N	N	N
UW-RAPID	Laura Lowes	Υ	NTY	None	Υ	Υ	Υ	N	N

#### Report—

• Accepted Invitation to participate in NHERI Researcher's Panel moderated by Laura Lowes: Diane Moug, Shiling Pei, Barbara Simpson, Alice Alipour, Katerina Ziotopoulou, Scott Harvey, Alejandro Martinez, and Jonathan Hubler.

#### Questions—

- Please let me know if your site needs any supplies for their presentation or NHERI site fair on Monday, June 20<sup>th</sup>.
- Also, we encourage you to bring swag to share with participants during the NHERI Site Fair on Monday, June 20<sup>th</sup>.

#### NHERI REU

#### **Important Dates**

- Block 1, June 1 August 9, 2022
- Block 2, June 13 August 19, 2022
- NHERI REU Research Symposium at TACC: August 8-9, 2022
- Monday- NHERI REU ECO Research Meetings (unless holiday June 20<sup>th</sup> & July 4<sup>th</sup>).
  - Block 1- 10:00 am 12:00 pm CT
  - o Block 2- 1:00-3:00 pm CT
- Wednesday (5)- NHERI REU Career Development Workshops 11:00 am -1:00 pm CT.

**ACTION ITEMS:** Please share graduate mentor and/or faculty mentor names as soon as you can. Thank you to FIU, Lehigh, and UT LSMS for sharing this information already.

#### Report—

#### • REU Applications

- o 31 NHERI REU Participants
- CONVERGE will not participate
- Lehigh and UCSD will have 4 participants.
- All other sites will host 3 participants.

#### **Block 1: UPDATED**

	First Name	Last Name	Email
	Destiny	Meyers	dzm2104@columbia.edu
E	Alejandra	Reyes	acreyes@usc.edu
	Bennard	Amponsah	amponb@rpi.edu
	Daniel	Coble	dncoble@gmail.com
Lehigh	Demetra Jamie	Karras	karrdd19@wfu.edu
igh	Eiry	Roman Carmona	eiry.roman@upr.edu
	Josué	Dieppa Ortiz	jadieppa@gmail.com
В	Carmen	Andrade	candrade@andrew.cmu.edu
Berkley	Mitchell	Given	mitchellrjgivens@gmail.com
Ÿ	Emilly	Ping	emilyping830@gmail.com
	Daleen	Torres Burgos	daleen.torres@upr.edu
Ę	Lindsay	Trask	lindstrask@gmail.com
	Borakan	Haller	bkhaller@purdue.edu
٦	Tobe	Onyekwelu	tobeonyekwelu@gmail.com

	Sabrina	Talghader	slt4@rice.edu
	Daynen Clouse		Daynen9160@gmail.com
DS	Joni	McCawley	jonimccawley@gmail.com
/TA	Greg	Gabriel	g_gabriel1@u.pacific.edu
8	Dela	Houssou	dela-houssou@student.kirkwood.edu

#### **Block 2: UPDATED**

	First Name	Last Name	Email
	Allison	Cavallo	allison_cavallo@brown.edu
USO	Matthew	Latham	malatham@calpoly.edu
	Nicholas	Mesa	nmesa@ufl.edu
	Sophrenia	David	szdavid@umass.edu
UCSD	Abigail	Brenton	abrenton@ucsd.edu
	Megan	Butcher	butchem3@my.erau.edu
LC.	Anna	Babchanik	ababchanik@csus.edu
UC DAVIS	Yahya	Bille	yahyabille13@gmail.com
/IS	Masen	Maggio	maggim@rpi.edu
	Nina	Simrill Smith	nsmith313@gatech.edu
N V	Keely	Patelski	keely.patelski@ttu.edu
	Allison	Vermaak	allisonvermaak@gatech.edu

- REU Programming (Green- RSVPed, Red- working on)
  - June 15: Social Media & Networking Workshop: Panel of REU & NHERI GSC members before a short workshop developed by the User Forum Subcommittee on Communications (Grace Wang, Marti LaChance, Amina, Adithya, Erica Fischer, NHERI REU Graduate Mentors)
  - June 29: Applying to Graduate School Workshop: Panel of REU & NHERI GSC members before a short workshop on applying to graduate school and personal statements (Tyler, Adithya, Jordan, Amber, Jasmine, Olaniyi)
  - July 6: DEI Workshop: Adapted by NHERI GSC Leadership from UCLA and VT. (Maggie, Harman, Olaniyi, Christine, Emmalyn, Holly, NHERI REU Graduate Mentors)
  - Industry Career Panel & Career Exploration Workshop: (REALLY COULD USE SOME REFERENCES HERE.)
  - Career in Research & Academia (Natural hazards faculty): (Katerina Ziotopoulou, Adam Zsarnócsay, Mohammad Khosravi, Stephanie Pilkington)
- NHERI REU Calendars listed in Appendix with Syllabus. Google Calendar can be accessed here: <a href="https://bit.ly/2022NHERI REUCalendar">https://bit.ly/2022NHERI REUCalendar</a>. Moodle will be finalized this week.

#### Questions—

 We will invite graduate mentors to participate in the Social Media & Networking Workshop, Applying to Graduate School Workshop, and DEI Workshop. If you know of a graduate mentor who you would like to voluntold or you know would like to volunteer, please let me know.

#### NHERI GSC

**Important Dates** 

- NHERI GSC Executive Committee first Friday of the month at 11:00 am Central Time.
- NHERI GSC General Meeting's now third Friday of the month at 11:00 am Central Time. Reworking the general meetings over the summer.

#### Report—

- **Membership:** 208 Registered
- Workshops in planning:
  - Jasmine Bekkaye & Olaniyi Afolayan:
    - June 10, 2022 @ 2:00pm: NSF Proposal Writing with Kurt Gurley & Lori Peek
    - September 9, 2022, TBA: Post-Disaster Reconnaissance and Post Natural Hazards Impacts- Mike Grilliot
  - Maggie Web & Harman Singh:
    - July 6, 2022 @ 11:00 am -1:00 pm: NHERI GSC present DEI Workshop to REU at the Career Development Workshop.
    - September 23, 2022 @ 11:00 am: NHERI GSC to host DEI Career Development workshop
  - o Taylor Heath & Hamed Todihi:
    - Proposed: Student Research In-progress Series
    - Research Programming Survey- awaiting results

#### New Business

June ECO Committee Meeting will be on Wednesday, June 21, 2022, from 4:15-5:00pm CT in person at the NHERI Summer Institute or hybrid if not in person.

- Adjourn
- Appendices:
  - o REU Calendar
  - REU syllabus
  - REU Google Calendar Link: https://bit.ly/2022NHERI\_REUCalendar.

### June

2022

Block 1 Block 2	Block 1 Block 2 Block 1 & 2					
Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
			1 REU Block 1 Start Pre-Assessment due	2 Block 1 Orientation 11am-2pm Central	3	4
5	6 Research Meeting#1 10am-12pm Central	7	8	9	10 Week#1	11
Social Media Post: WHO I AM	REU Block 2 Start Pre-Assessment due Research Meeting#2 10am-12pm Central	14 Block 2 Orientation 12am-3pm Central	Career Development Meeting#1: Social Media & Networking 11am-1pm Central	16	Research Meeting#1 1pm-3pm Central	18
19	20 NHERI Summer Institute	NHERI Summer Institute	NHERI Summer Institute	23	24	25
26 Social Media Post: MEET MY MENTOR	Research Meeting#3 10am-12pm Central Research Meeting#2 1pm-3pm Central	28	29 Career Development Meeting#2: Applying for Graduate School Panel (Graduate & Faculty Panel) 11am-1pm Central	30	1	



## July

Block 1 Block 2 Block 1 & 2						
Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
					1	2
3	4	Research Meeting#4 10am-12pm Central Research Meeting#3 1pm-3pm Central	6 Career Development Meeting#3: DEI & Implicit Bias in Engineering 11am- 1pm Central	7	8	9
Social Media Post: MY NHERI SITE	Research Meeting#5 10am-12pm Central Research Meeting#4 1pm-3pm Central	12	13	14	15	16
17	Research Meeting#6 10am-12pm Central Research Meeting#5 1pm-3pm Central	19	20 Career Development Meeting#4: Industry Career Panel & Career Exploration 11am-1pm Central	21	22	23
2.4 Social Media Post: RESEARCH IN ACTION	Research Meeting#7 10am-12pm Central Research Meeting#6 1pm-3pm Central DS ACADEMY	DS ACADEMY	Career Development Meeting#5: Career in Research or Academia 11am-1pm Central DS ACADEMY	DS ACADEMY	DS ACADEMY	30

# August

2021

Block 1 Block 2	Block 1 & 2					
Sunday	Monday	Tuesday	Wednesday	Thursday	Friday	Saturday
31	Research Meeting#8 10am-12pm Central Research Meeting#7 1pm-3pm Central	2	ALL REU STUDENTS- Research Symposium Presentation Practice 8:00am-6:00pm Central	4	5	6
7 PHOTO CONTEST: HELLO, AUSTIN! *Arrive in Austin for REU Research Symposium	8 NHERI REU Research Symposium @ TACC 8:00am-5:00pm Central	9 NHERI REU Research Symposium @ TACC 8:00-5:00pm Central REU Block 1 End Due: Week 10 timesheet, final paper, poster, & presentation, & REU Post-Assessment	10	11	12	13
14	Research Meeting#8 1pm-3pm Central	16	17	18	REU Block 2 End DUE: Week 10 timesheet, final paper, poster, & presentation, & REU Post-Assessment	20
21	22	23	24	25	26	27
28	29	30	31			



#### Natural Hazards Engineering Research Infrastructure

#### **Facilitator**

Dr. Robin Nelson Education Specialist, NHERI ECO College of Engineering, The University of Texas at San Antonio One UTSA Circle San Antonio, TX 78249

Email: robin.nelson@utsa.edu

Phone: 210.896.8744

Zoom Room: https://utsa.zoom.us/my/robin.nelson (\*used for all group and

individual meetings with NHERI ECO)

#### **Program Description and Objectives**

The goals of the NHERI REU summer program include:

- Providing research experiences for undergraduate students
- Providing career exposure within the NHERI fields
- Providing mentorship with an experienced engineer/researcher

#### Site Events

Each REU student will be assigned to a NHERI site. You are expected to follow all rules at each of your sites. Faculty mentors and site managers will provide feedback on your performance. If you have any questions, please ask.

#### **REU Meetings**

You are expected to participate in all NHERI REU research and career development meetings. If there is an extenuating circumstance, please send an email as soon as you are aware of the situation to <a href="mailto:robin.nelson@utsa.edu">robin.nelson@utsa.edu</a>.

#### Readings and Instructional Materials:

IEEE Conference Template

How to Write a Research Journal Article in Engineering & Science

Journal articles that address your topic

Other scholarly sources as necessary

#### **Expectations:**

NHERI expects you to act and respond professionally in your interactions with others and in completing your assignments and deliverables. Failure to do so may result in loss of pay and/or dismissal from the program.

#### Course Schedule for Block I & II (tenative and subject to change):

		R	REU Block I	
	Week	Deliverables due	Topics	Meetings: Research & Career Development
1	June 1-3	Wednesday, June 1 Pre-Assessment	Welcome to NHERI REU — get to know your site, your peers, and your mentors.	June 2 Block I Orientation 10am-12pm Central
2	June 6-10	Friday, June 10 Timesheet 1 Reflection 1 Media Release Sample Journal Article Study Consent	Let's Review— identify, read, and write 5 annotations on journal articles  Skill—identify, summarize, paraphrase, and cite scholarly sources.	Research Meeting#1 June 6, 10am-12pm Central
3	June 13-17	Friday, June 17 Timesheet 2 Reflection 2 Annotated Bibliography First Meeting Form	Introducingyour topic! Write the draft of your introduction.  Skill-hook, inverted triangle writing	Research Meeting#2 June 13, 10am-12pm Central Career Development Workshop#1: Social Media & Networking June 15, 11am-1pm Central
4	June 20-24	Friday, June 24 Timesheet 3 Reflection 3 Introduction Draft		
5	June 27- July 1	Friday, July 1 Timesheet 4 Reflection 4 Literature Review Draft Natural Hazards Module Personal Statement	The What—Dig into your topic and uncover the gap to write your literature review.  Skill—identify purpose, identify gap	Research Meeting#3 June 27, 10am-12pm Central  Career Development Workshop#2: Applying to Graduate School June 29, 11am-1pm Central
6	July 4-8	Friday, July 8 Timesheet 5 Reflection 5 Instrumentation & Methodology Draft	The How-Explain the materials, instruments, and methods you will use to conduct your research.  Skill-quantitative research methods, format and figures	Research Meeting#4 Tuesday, July 5, 10am-12pm Central  Career Development Workshop#3: Diversity, Equity, and Inclusion July 6, 11am-1pm Central

7	July 11-15	Friday, July 15 Timesheet 6 Reflection 6 Peer Review	Peer Review—Learn about the journal peer review process and learn to give and take feedback.  Skill—editing and revising	Research Meeting#5 July 11, 10am-12pm Central
8	July 18-22	Friday, July 22 Timesheet 7 Reflection 7 Revision Lesson Plan	Mission Objectives- Develop a lesson plan for your site to use with K-12 students. Skill- writing objectives and lesson plans	Research Meeting#6 July 18, 10am-12pm Central  Career Development Workshop#4: Industry Career Panel & Career Exploration July 20, 11am-1pm Central
9	July 25-29	Friday, July 29 Timesheet 8 Reflection 8	The Closing write a draft of your results, discussion, and conclusion.  Skill— analysis and reporting of data	Research Meeting#7 July 25, 10am-12pm Central  Career Development Workshop#5: Career in Research or Academia July 27, 11am-1pm Central
10	August 1-5	Friday, August 5 Timesheet 9 Reflection 9 Final Paper Draft Cover Letter & Resume	Preparing for the Next Steps—Continue writing, revising, and provide presentation feedback.	Research Meeting#8 August 1, 10am-12pm Central  Presentation Practice August 3, 8am-6:00pm Central
10	August 8-12	Tuesday, August 9 Timesheet 10 Reflection 10: In- person Focus Group Final Paper Final Presentation Final Research Poster Post-assessment	Finish Strong— Publish your research and share your experience and ideas to improve the program in the post-assessment.  Skill- publish, qualitative research methods, Data Depot	
RS	August 8-9	Upload poster, paper, presentation to Data Depot no later than August 15.	Research in Action— Present your poster and paper for mentors and peers.	NHERI REU Research Symposium @ TACC, August 8-9, 8:00am-5:00pm Central

	REU Block II						
	Week	Deliverables due each Friday	Topics	Meetings: Research & Career Development			
1	June 13-17	Monday, June 13 Pre-Assessment Friday, June 17 Timesheet 1 Reflection 1 Media Form Sample Publication Study Consent	Welcome to NHERI REU — get to know your site, your peers, and your mentors. Skill—identify scholalry sources	NHERI REU Block 2 Orientation June 14, 12am-2pm Central Career Development Workshop #1: Social Media Network June 22, 11am-1pm Central			
2	June 20-24	Friday, June 24 Timesheet 2 Reflection 2 Annotated Bibliography First Meeting Form	Let's Review— Review the literature that supports your topic and write an annotated bibiliography for 5 journal articles.  Skill—summarize, paraphrase, cite	Research Meeting#1 Friday, June17, 1-3pm Central			
3	June 27- July 1	Friday, July 1 Timesheet 3 Reflection 3 Introduction Draft Natural Hazards Module	Introducingyour topic! Write the draft of your introduction.  Skill-hook, inverted triangle writing	Research Meeting#2 June 27, 1-3pm Central  Career Development Workshop#2: Applying to Graduate School June 29, 11am-1pm Central			
4	July 4-8	Friday, July 8 Timesheet 4 Reflection 4 Literature Review Draft Personal Statement	The What—Dig into your topic and uncover the gap to write your literature review.  Skill—identify purpose, identify gap	Research Meeting#3 July 5, 1-3pm Central  Career Development Workshop#3: Diversity, Equity, and Inclusion July 6, 11am-1pm Central			
5	July 11-15	Friday, July 15 Timesheet 5 Reflection 5 Instrumentation & Methodology Draft *Natural Hazards Workshop	The How-Explain the materials, instruments, and methods you will use to conduct your research.  Skill-quantitative research methods, format and figures	Research Meeting#4 July 11, 1-3pm Central			

6	July 18-22	Friday, July 22 Timesheet 6 Reflection 6 Peer Review	Peer Review—Learn about the journal peer review process and learn to give and take feedback.  Skill—editing and revising	Research Meeting#5 July 18, 1-3pm Central  Career Development Workshop#4: Industry Career Panel & Career Exploration July 20, 11am-1pm Central
7	July 25-29	Friday, July 29 Timesheet 7 Reflection 7 Revision Lesson Plan	Mission Objectives- Develop a lesson plan for K-12 students. Skill- writing objectives and lesson plans	Research Meeting#6 July 25, 1-3pm Central  Career Development Workshop#5: Career in Research or Academia July 27, 11am-1pm Central
8	August 1-5	Friday, August 5 Timesheet 8 Reflection 8 Resume & Cover Letter	The Closing write a draft of your results, discussion, and conclusion.  Skill-analysis and reporting results	Research Meeting#7 August 1, 1-3pm Central  Presentation Practice August 3, 8am-6pm Central
9	August 8-12	Tuesday, August 9 Reflection 9: In-person Focus Group  Friday, August 12 Timesheet 9 Final Poster Final Presentation	Preparing for the Next Steps—Continue writing, revising, and provide presentation feedback.	
10	August 15-19	Friday, August 19 Timesheet 10 Reflection 10 Final Paper Post-assessment	Finish Strong—Publish your research and share your experience and ideas to improve the program in the post-assessment.  Skill- publish, qualitative research methods, Data Depot	Research Meeting#8 August 15, 12-2pm Central
RS	August 8-9	Upload poster, paper, presentation to Data Depot no later than August 26.	Research in Action— Present your poster and paper for mentors and peers.	NHERI REU Research Symposium at TACC, August 8-9, 8:00am-5:00pm