

HISPANIC ALLIANCE FOR THE
GRADUATE EDUCATION AND
THE PROFESSORiate ON
ENVIRONMENTAL SCIENCES
AND ENGINEERING
(H-AGEP)

*A Model to Increase Latino Representation in
College STEM Faculty*

14th Annual AHSIE Best Practice Conference

March 28th, 2021



WHY H-AGEP?

- ✓ Representation of Hispanic and URM faculty on campus had a positive impact on URM student success.
- ✓ Hispanics comprised only 5% of all full-time faculty in degree-granting postsecondary institutions. The percentage is even lower in STEM areas.
- ✓ 52% of Hispanic undergraduates attend community college (CC). However, only one in ten Hispanic students who start at a CC completed a degree at a four-year institution.



Need to increase the number of Hispanic Faculty in STEM fields.



The low percentage of Hispanics in STEM faculty positions is primarily driven by their low representation in graduate programs



H-AGEP GOAL AND OBJECTIVES

Develop, implement and study a model for training and transitioning Hispanic STEM doctoral students as they transition to STEM instructional faculty or staff positions at community colleges (CC) or other associate degree granting institutions.



H-AGEP MODEL



Phase I

Mentorship Program

Teaching coach

Teaching mentor

Dissertation advisor



Phase II

Academic and Professional Training

Teaching training

Undergraduate mentoring

Professional development workshops



Phase III

Transition to the Professional Life

Mentoring and Networking

Professional Development Workshops

Applying, Finding, and Transitioning into a New Faculty Position at CCs

H-AGEP FELLOWS

COHORT 1



Adrian Diaz, CCNY



Natalia Quintero, CCNY



David Melecio-Vazquez,
CCNY



Joanne Moyer, UTEP



Anna Pina, UTEP



Eric Galvan, UTEP

COHORT 2



Joan Gomez, CCNY



Alana Menendez, CCNY



Eder Herrera, CCNY



Victor Garcia, UTEP



Jane Martinez, UTEP



Katalina Salas, UTEP



Ashley Payan, UTEP

COHORT 3



Rose Jimenez, CCNY



Jorge Guerrero, CCNY



Kathleen Schaeffer, UTEP



Olga Soto, UTEP



Maribel Baeza, UTEP



Juan Fernandez, UTEP

COHORT 4



Richard Monge, CCNY



Laura Rivas, CCNY



Enrique Garcia, UTEP



Angel Armenta, UTEP

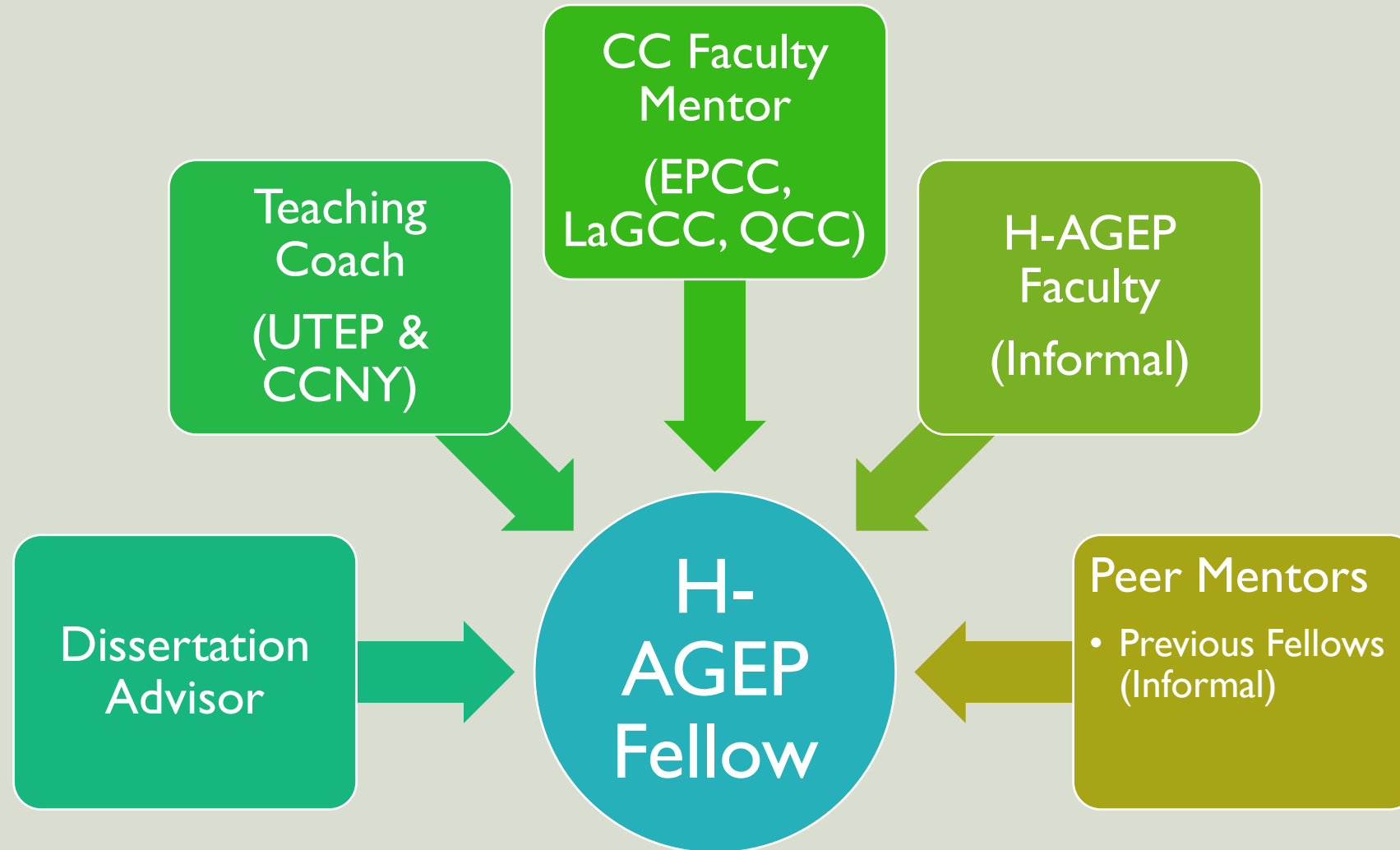


Jose Hernandez, UTEP



Nora Cuvelier, UTEP

H-AGEP FELLOW MENTORSHIP PROGRAM



PROGRAM ACTIVITIES



TEACHING TRAINING



UNDERGRADUATE
MENTORING



PROFESSIONAL
DEVELOPMENT WORKSHOPS

ACTIVITY 1: TRAINING IN EFFECTIVE TEACHING IN STEM DISCIPLINES

Two components occur concurrently in spring semester:

Teaching Training

- Teaching Coaches meet with Fellows bi-weekly to review 7 Modules related to undergraduate STEM teaching and learning (CIRTL)
- Fellows review the application of the modules and how this informs their teaching styles and interactions with students
- By end of semester, Fellows will create STEM course syllabi, lesson plans, teaching philosophy, research, and diversity statements



ACTIVITY 1: TRAINING IN EFFECTIVE TEACHING IN STEM DISCIPLINES

Practicum at the Community College

- Fellows are partnered with a CC Mentor from a similar academic background
- Fellows lead instruction in the CC classroom on at least two occasions
- Fellows get continued mentoring/guidance from their CC mentors on how to present material, engage and mentor CC students
- Teaching Coaches to engage with CC Mentors to review the 7 Modules and reinforce Fellow's learning of teaching pedagogy

ACTIVITY 2:
H-AGEP
FELLOWS
CUTTING-
EDGE STEM
RESEARCH
AND
MENTORSHIP
TRAINING

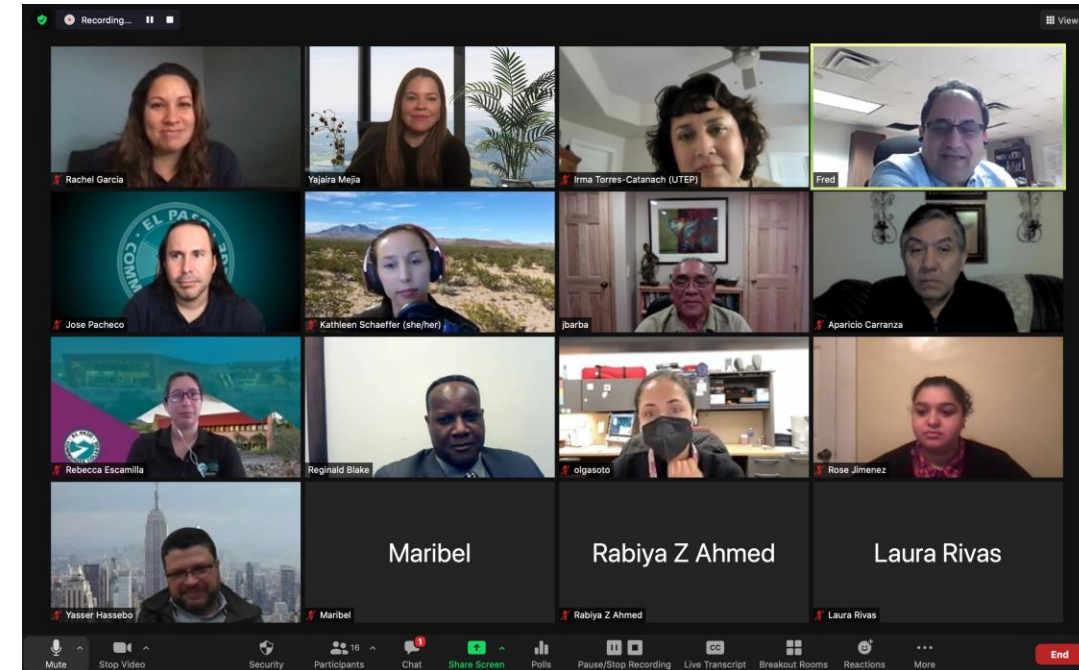
Skills Improved Through the Mentoring Activity

The Fellow improves the following skills:

- Develop a research project plan and timeline
- Selection process of undergraduate students (UGS) (i.e. required skills set, interview, etc.)
- Evaluation and assessment of the UGS in the research projects
- Identify research topics that match UGS ability
- Guide and advise UGS in academic and non-academic aspects
- Improve soft skills
- Devise a plan for the further work (Publications, next step, etc.)

ACTIVITY 3: PROFESSIONAL DEVELOPMENT WORKSHOPS

- **Developing STEM Research and Educational Programs**
November 2020. Panelists: Profs. Craig E. Tweedie (UTEP), and Syed Rashid Zaidi, Bronx College Community
- **Career Paths at Community Colleges workshop.**
October 2021. Panelists: Profs. Joe Barba (CCNY), Miguel Velez-Reyes (UTEP), Yasser Hassebo (LaGCC), Aparicio Carranza (CityTech) and Rachel Garcia (San Jacinto College).
- **Think of it as Strategic Persuasion: Effectively negotiate for what you need to be successful**
November 2021. Speaker: Dr. Yvette Maria Huet
- **Faculty Job Application Workshop**
February 2022. Panelists: Profs. Aparicio Carranza (CityTech), Rachel Garcia (San Jacinto College), Joe Barba (CCNY), Miguel Velez-Reyes (UTEP), Jose Pacheco (EPCC), Fred Moshary (CCNY), Reggie Blake (CityTech), Yasser Hassebo (LaGCC), and Rebecca Escamilla (EPCC).



H-AGEP ACCOMPLISHMENTS

- 25 Fellows have been recruited
- All Fellows completed the teaching training program
- 19 Fellows had in-classroom teaching experience at community colleges
- Fellow's successful stories:
 - One Fellow got the Tandon Faculty First Look Fellowship
 - Fellows have transitioned into professional jobs. Some of these include assistant professor of instruction at UTEP, and engineers at the Gulfstream Aerospace, NASA contractor, and El Paso Electrical Company.

H-AGEP TEAM

