

CITY TECH CUE CONFERENCE 2019

Transforming Teaching Into Learning

May 10, 2019

Conference Program



Table of Contents

Welcome to the CUNY CUE Conference 2019	4
Program	6
8:00 AM Registration and Pre-conference Sessions	6
9:00 AM Welcoming Remarks and Keynote Presentation	7
11:00 AM Concurrent Sessions	8
12:00AM Concurrent Sessions	10
1:00 PM Lunch and Guided Tours	15
2:00 PM Concurrent Sessions	16
3:00 PM Concurrent Sessions	25
4:00 PM Reception	34
Acknowledgements	35

Key: (IW) Interactive Workshop • (OP) Oral Presentation • (PD) Panel Discussion

Welcome to the CUNY CUE Conference 2019

The Conference is focused on “Transforming Teaching into Learning.” The annual CUE conference is an opportunity to share evidence-based practice across CUNY aimed at improving student success, retention and graduation, and successful transfer.

Today's conference focuses on six thematic strands:

- What Transforms Teaching into Learning? Learning as Reflective Practice
- Who is at the Table? Learning for All
- Where is the Public Discourse? Learning in the Open
- Why This Place? Learning Beyond the Classroom Walls
- How Do Leaders Emerge? Learning to Achieve
- When Do Transitions Matter? Learning as Power

CUE Conference Organizing Committee:

Lauri Aguirre, Pamela Brown, Alejandro Cantagallo, AE Dreyfuss,
Julia Jordan, William Luperena, Kevin Rajaram, Adam Walker, Philip Zeng

New York City College of Technology • Academic Complex • 285 Jay Street, Brooklyn, NY 11201

This year's participants are from the following CUNY Colleges





Message from President Russell K. Hotzler

It is my pleasure to welcome you to this year's CUNY Coordinated Undergraduate Education (CUE) Conference, one of the first events to be held in our new academic complex. We are honored to host this year's conference, focused on Transforming Teaching into Learning, with over 60 presentations and 250 attendees. Thank you for coming, and for your contributions to supporting our mutual commitment to sharing strategies that promote student success and cross-campus collaborations.



Message from Provost Bonne August

It is a great pleasure to welcome the CUE Conference to City Tech and to our beautiful new Academic Complex. This year's conference, "Transforming Teaching into Learning," continues a long and fruitful CUNY tradition of bringing together faculty members from across the university to share their ideas and their practice. Today's gathering concentrates on the interaction at the heart of all education: the creative partnership between teacher and students that makes rich and enduring learning happen. May your discussion be lively and productive.

8:00 AM – 9:00 AM Registration and Pre-conference Sessions

Registration and Continental Breakfast

8:00–9:00am • Lobby Atrium

Queens College

8:30–8:55am • A 104

Keeping it R.E.A.L. with Students: Talking about Retention, Engagement, and Advisement Learning Outcomes (IW)

Danielle Izzo

The QC in 4 Program is an exciting new initiative led by the Academic Advisement Center at Queens College. Through mandatory advisement services, a student Commitment Form, structured academic program maps, and assistance with providing unavailable courses that may delay graduation, QC in 4 emphasizes a partnership between the college and student in order to graduate in four years. This presentation will offer best practices, showcase the benefits of QC in 4, and how rigorous marketing campaigns are normalizing intentional advisement practices and regular course planning with an academic advisor.

New York City College of Technology

8:30–8:55am • A 106

Place-based Learning in an Interdisciplinary Course: Environmental Economics (IW)

Sean MacDonald

Students in ECON 2505ID – Environmental Economics – are introduced to place-based learning as a means of enhancing the study of the local environment. Thus, place-based learning in the course emphasizes the importance of making connections between the study of environmental topics and issues and the actual experience, observation and investigation of those issues through direct or virtual exploration in real world settings.

The focus is on the value of drawing upon the resources of the local community as a learning laboratory. Important guiding questions are: How can we become aware of the environment of our immediate surroundings and think about what information this environment has to offer that can enhance what students learn in the classroom setting? How is what is learned from the local environment applicable to the bigger picture? The inclusion of invited guest lecturers from other disciplines throughout the semester also encourages more complex critical thinking about these questions.

To explore place-based applications, students have participated in class tours of the Brooklyn Grange urban rooftop farm in the Brooklyn Navy Yard. The tours are conducted early in the semester. As students are guided in the process of making connections between the study of the environment and actual first-hand observation and study, they are encouraged to think about place-based applications more broadly, in terms of how they might use this strategy in their own semester research projects.

9:00 AM – 10:45 AM Welcoming Remarks and Keynote Presentation

Welcoming Remarks

9:15–9:45am • Theater

President Russell K. Hotzler
Provost Bonne August
Senior University Dean Lucinda R. Zoe

Introduction of Keynote Speaker

Associate Provost Pamela Brown

Keynote Presentation

9:45–10:45am • Theater

Dr. Sandra Yancy McGuire

Metacognition: The Key to Transforming Students Into Learners



Dr. Sandra Yancy McGuire is the Director Emerita of the Center for Academic Success and retired Assistant Vice Chancellor and Professor of Chemistry at LSU. Prior to joining LSU, she spent eleven years at Cornell University, where she received the coveted Clark Distinguished Teaching Award. She has delivered keynote addresses or presented workshops at over 400 institutions in 46 states and ten countries. Her book, *Teach Students How to Learn: Strategies You Can Incorporate into Any Course to Improve Student Metacognition, Study Skills, and Motivation*, was released in October 2015 and is a Stylus Publishing bestseller. The student version of this book, *Teach Yourself How to Learn: Strategies You Can Use to Ace Any Course at Any Level*, was released in January 2018.

Thank you to Dr. Sandra McGuire for sharing her [keynote presentation](#) and [workshop presentation](#) to all conference attendees.

11:00 AM – 11:50 AM Concurrent Sessions

CUNY Graduate Center

11:00–11:50am • Theater

Digital Tools for Open Teaching and Learning (IW)

Laurie Hurson & Krystyna Michael

In this presentation, we introduce two open digital platforms that can facilitate student-centered, collaborative learning: the CUNY Academic Commons and Manifold. These platforms support Open Digital Pedagogy, a philosophy and practice of teaching that emphasizes shared knowledge production and experiential, active, and networked-learning.

We will demonstrate how the CUNY Academic Commons allows instructors to host course materials, including Open Educational Resources (OER), facilitate discussion, and craft assignments that task students with connecting course content to public discourses beyond the classroom. We will also introduce Manifold, an intuitive, collaborative platform for scholarly publishing on which instructors can publish annotatable editions of public domain texts and OER along with supplementary notes, files, images, videos and interactive content.

This presentation will demonstrate several models of open teaching on the CUNY Academic Commons, and showcase a range of digital Manifold texts with dynamic, embedded resources and collaborative annotation. We will also discuss how the Graduate Center's Digital Initiatives and Teaching and Learning Center are working together to support faculty across the CUNY system who want to open their teaching, integrate experiential learning strategies, and OER into their curricula, and facilitate class engagement with broader communities.

Hostos Community College

3:30–3:55pm • A 409

Teaching in a Total Institution: Toward a Pedagogy of Care in a Prison Classroom (OP)

Edme Soho & Lauren Wolf

College-in-prison programs are emerging all over the country, and increasingly, incarcerated students are completing coursework and earning degrees within these institutions. In addition to the obstacles presented by incarceration, many students have had uncomfortable experiences with traditional teaching methods or find it difficult to envision themselves doing well in certain areas of study such as STEM courses. This talk explores how a pedagogy of care can be utilized to create welcoming, encouraging, and effective learning spaces for incarcerated students. The talk discusses a math professor's implementation of a pedagogy of care and the educational outcomes of her students to demonstrate the method's value within college-in-prison programs. Students' educational experiences are captured through students' narratives of their experiences during the professor's math classes in prisons. The aim of this paper is to encourage teachers interested in teaching in college-in-prison programs to incorporate the components of a pedagogy of care into their approach to teaching incarcerated students.

Kingsborough Community College

11:00–11:50am • A 103

Growing Leaders: Peer Mentors Giving Back to Learning Communities (IW)

Anush Grigoryan, George Hill, Paula Risolo & Anna La Franceschina (Brooklyn College)

In 2013, the Opening Doors Learning Community Program created leadership roles for former learning community students to give back through Peer Mentoring. Peer mentors are continuing students who participated in a Learning Community during their first semester. The peer mentors are assigned to work within the 1-credit student development (SD) class that is a part of the three courses that make up the freshmen learning community. The peer mentor attends each SD class and assists the Case Manager and freshmen assigned to that specific link. The mentors organize groups of LC students to attend campus events, maintain social media, share information, organize study groups, and advise and encourage students to become involved with campus clubs or activities that they may be interested in. Most recently, they created group mentoring where they meet students on campus throughout the term and hold discussions based on that week's theme created by the PM (time management, expectations, diversity, etc). Additionally, all mentors meet as a group monthly to refresh their training and to address issues they are experiencing. The peer mentors also become official student ambassadors to the college and attend a leadership retreat. The Peer mentors do not get paid for their role in the learning communities. They volunteer their time so they can give back to the learning community and help the students as they were helped during their first term. The presenters are the co-coordinators of the program, as well as a current and former peer mentor students.

11:00 AM – 11:50 AM Concurrent Sessions

John Jay College of Criminal Justice

11:00–11:50am • A 104

Teaching towards Capacities: Co-Pedagogical Approaches to Faculty Development (IW)

Gina Foster

The value of co-curricular programming for public, urban community and four year college students has been demonstrated through multiple studies that have tested such partnerships as embedded tutoring, supplemental instruction, peer-assisted learning, and mentoring programs. However, what has not been investigated at public, urban community and four year colleges is the value of co-pedagogical programming in faculty development, meaning those intentional professional development activities that present teaching faculty with intersections of holistic, self-efficacy approaches to student learning and focused pedagogical interventions. At John Jay College of Criminal Justice, the John Jay Teaching and Learning Center has designed and implemented a broad range of such activities, with promising results beginning to emerge in our third year of engagements.

Such pairings as self-efficacy models with cognitive science-based learning, open pedagogical and zero cost textbook practices with Gen Ed/Pathways courses, and anti-racism methodologies with STEM courses are already showing innovative changes in instruction while also encouraging the formation of faculty peer networks around these collaborative approaches.

This interactive workshop presentation will share the overall context for co-pedagogical faculty development programming, describe the framework of exposure, exploration, and expression within which we work, and share examples of co-pedagogical projects in action, from semiannual Faculty Development Days to formal funded track seminars to ongoing working groups and one-time events. Those attending will be guided through reflection on two examples of co-pedagogical activities for their own courses and will receive a list of recommended co-pedagogical partnerings for disciplinary areas and academic levels.

Brooklyn College

11:00–11:50am • A 106

Case Study: Obstacles and Strategies to Launching a First Year Experience (IW)

Tracy Newton, Estefania Ponti & Nicole St. Clair

This presentation will discuss how Brooklyn College launched a First Year Experience within a centralized academic momentum initiative in spite of stagnant budgets, limited staff, and changes in administrative positions. By employing innovative thinking, the First College Year program built support services and offered technological platforms to ensure first year students imagined their “Future in Four,” the title of Brooklyn College’s academic momentum campaign. This campaign looked to establish student success, retention, and completion by meeting the following pivotal first-year student benchmarks: informed choice of a meta-major or major, enrollment in 30 credits, and completion of gateway mathematics and English requirements. Specifically, we will outline how a newly created academic orientation not only created the foundation, but also served to refocus other programmatic offerings and services within the newly created Student Success Division, including curricular changes, block programming, supplemental instruction, Degree Maps, DegreeWorks, E-notes, Early Alerts, and Blackboard. After a discussion of implementation and assessment, the presenters will lead an activity to identify difficulties as well as develop solutions to launching a First Year Experience on participants’ campuses. The goal of this session is to give participants the opportunity to learn that creative thinking and budget alignment can lead to concrete strategies and implementation.

Hostos Community College

11:00–11:50am • A 209

Zero-Cost Contextualized Corequisite Statistics Resources (IW)

AJ Stachelek

In this presentation, participants will learn about how one faculty member utilized multiple open-educational resources to create several chapters for a co-requisite statistics textbook that not only combined the necessary algebraic skills just in time for the subsequent statistical concepts, but also utilized the contexts and settings specific to Hostos Community College students in the South Bronx. Furthermore, the faculty member integrated several collaborative exercises to enhance and further develop students’ abilities to interact with data and experience it through multiple learning lenses. Some lessons also utilize free online resources to allow students to investigate difficult statistical concepts. The development of these materials was motivated by the need to improve equitable access to resources for students who find textbook costs to be a limiting factor in their ability to succeed. Even more importantly, these materials allow students to investigate and explore data with which they have personal experience, thus enabling them to access their own ability to form hypotheses that can be investigated using the statistical methods they learn in the co-requisite statistics course.

12:00 PM – 12:55 PM Concurrent Sessions

New York City College of Technology

12:00–12:50pm • Theater

A Commons for Open Learning: Voices from New York City College of Technology's OpenLab (PD)

Jill Belli, Claire Cahen, Kim Cardascia, Cailean Cooney, Charlie Edwards, Karen Goodlad, Genevieve Hitchings, Anna Matthews Sarah Paruolo, Jonas Reitz, Jesse Rice-Evans, Jody Rosen, Jennifer Sears, Jenna Spevack

When New York City College of Technology's OpenLab launched in 2011, its team anticipated students, faculty, and staff creatively imagining it as a platform to learn, work, and share within and beyond the college community. The open digital platform, built with blogging and social networking software (WordPress, BuddyPress), thrives with innovative member-generated content. The 28,000+ OpenLab members have pushed it in new and exciting directions. Stakeholder groups have had a significant impact both in modeling effective critical pedagogy and creative usage, and in shaping OpenLab innovations in design and functionality; these include First-Year Programs, First-Year Learning Communities, STEM Success, and their peer mentors; Living Lab General Education Seminar, WeBWork math homework integration, Digital Pathways (BMCC-New York City College of Technology transfer in digital programs); and the Faculty Commons and Provost's Office. In 2018, the OpenLab team, in partnership with the Graduate Center's Commons in a Box (CBOX) project, released CBOX OpenLab, which offers institutions the ability to create an OpenLab in their local context.

This session includes lightning-talk presentations from OpenLab stakeholders whose work transforms teaching into learning and underscores that teaching and learning aren't one-directional but instead networked, and at their best, happening when teachers and students are critical co-collaborators. Presenters will reflect on the conference's thematic questions, considering what it means to learn and work in the open, and how that is a democratizing and empowering opportunity. Attendees can also join the conversation, ask questions of the presenters, and consider how CBOX OpenLab can share with other schools these opportunities for open learning.

Keynote Workshop

12:00–12:50pm • A 105

Motivating Students: Strategies That Work (IW)

Saundra Yancy McGuire

Director Emerita, Center for Academic Success
(Ret) Assistant Vice Chancellor & Professor of Chemistry
Louisiana State University

Motivating today's students to actively engage in learning activities proves challenging for most faculty. Very often millennial students do not respond as did students in the past to extrinsic motivators such as bonus quizzes and extra credit assignments. However, as James Raffini presents in *150 Ways to Increase Intrinsic Motivation in the Classroom*, when the psychoacademic needs of students are met in creative ways, student motivation soars. This presentation will engage faculty in a discussion of addressing student needs for autonomy, competence, relatedness, self-esteem, and enjoyment in order to significantly increase student motivation.

12:00 PM – 12:55 PM Concurrent Sessions

Hostos Community College

12:00–12:25pm • A 103

Utilizing Writing Across the Curriculum to Enhance Learning in a Dental Hygiene Course (OP)

Sean Gerrity & Diana Macri

As future health care providers, dental hygiene students will be called upon to resolve ethical dilemmas taking into consideration a plethora of factors including social norms, cultural diversity, personal experience, religious values and legal restrictions. Hostos Community College offers its students the opportunity to delve into issues of ethics and professional responsibility through its mandatory course, Ethics, Jurisprudence and Practice Management. Writing Across the Curriculum (WAC) is a pedagogical movement which promotes the use of writing as a method of learning. Hostos Community College encourages WAC predominantly through Writing Intensive (WI) Courses; these are courses in which writing plays an integral part in the course curriculum and are rare in STEM disciplines. The purpose of a WI course is to maximize opportunities for meaningful writing experiences and to utilize writing as a tool to teach subject matter in a way that allows students to process what they know and express it in their writing. In the fall of 2015, as part of the WI program at Hostos, a CUNY Writing Fellow partnered with a dental hygiene professor to create the WI course “Ethics, Jurisprudence and Practice Management”. The creation and implementation of this course, offered to second year students in the Dental Hygiene Program at Hostos Community College will be detailed and discussed, including an honest appraisal of its effectiveness as measured by surveys completed by students and collected by the WAC coordinators. Best practices and ideas for improvement will also be presented.

Hostos Community College

12:00–12:25pm • A 103

Writing in the Digital Age: Reflective Journaling (OP)

Mary Manning

Senior students use Reflective Journaling, once a week (via BB), to assess and reflect on their clinical experience for that week. They have to answer specific questions in learning, self-assessment, communication, professionalism and emotion and personal growth. One question from each category is answered to address a specific problem and they have a rubric to follow for assessment. Confidential feedback is given to the student by the instructor and students can bring these reflective experiences into clinic so other students can learn from the student's process of learning. This practice encourages informal writing, students' thinking, problem-solving and conscious decision-making. Students appreciate the opportunity to reflect on clinical situations after the fact. The quality of writing and reflection about learning is outstanding. I do not edit the writing, which encourages the whole process.

Bronx Community College

12:00–12:25pm • A 104

Teaching Collaborations: Utilizing Library Resources to Re-design an Undergraduate Chemistry Course (IW)

Carl Andrews & Dickens St. Hilaire

The Chemistry 12 course has been classified as a “high risk” class because of the number of students who withdraw and fail. During the spring 2016 semester, the passing percentage for the CHM12 class was just below 54% and the withdrawal rate was 37.4%. In the spirit of supporting Bronx Community College's 35 X 65 campaign and in the interest of improving retention and graduation rates in ASAP and STEM students, Professors Dickens St. Hilaire (Chemistry) and Carl R. Andrews (Library) have partnered to implement a number of teaching and learning strategies to enhance the course and improve student engagement. This grant funded project involves adding more hands on activities, a library research component, academic support from peer-mentors, a field observation assignment, and membership to the American Chemical Society. These activities promote critical thinking, professional development, scholarly communication, and undergraduate research.

12:00 PM – 12:55 PM Concurrent Sessions

Brooklyn College

12:00–12:25pm • A 104

Experiential Learning in the Library: The STEM Information Internship for Undergraduate Students (IW)

Lee Ann Fullington & Alexandra Torres

Brooklyn College Library established a Science Information Internship program in Fall 2015 to expose undergraduate students to the potential career path of STEM librarianship. The internship takes learning beyond the classroom and into the library in a new way. Rather than focusing on instruction, as many students may receive in their composition classes or upper level major classes, the internship is a form of experiential learning that can engage and prepare a student for a rewarding career by introducing the student to core facets of STEM librarianship. The internship also provides a foundation for library school, the next step to becoming a librarian after receiving a bachelor's degree.

In summer 2016, our intern, a mathematics major, partnered with our subject liaison librarian for math to create new research guides and assisted with selecting materials for the library to purchase in support of the mathematics curriculum. Our presentation will feature the intern's own experiences as a student and how this led to a deep and enduring partnership between librarian and intern. Valuing and leveraging the expertise of undergraduate students, learning from them, and centering their knowledge in purchasing decisions and content for research guides is a way to empower undergraduates and connect them to their library and campus as they gain hands-on experience to begin building a library career.

New York City College of Technology

12:00–12:25pm • A 106

Finding Connections: Making an Existing Biology Course Interdisciplinary And Using the Experience for the Traditional Course and OERs (IW)

Tatiana Voza

Adapting an existing introductory biology course to make it interdisciplinary and successful is an interesting experience and process. With imperatives such as lecture and lab components, a dense curriculum, preexisting learning outcomes and students with different levels of interest, adding material to provide relevant context to show how both scientific and social knowledge relate to broader aspects of the human experience, can be challenging. However, once achieved such a course provides epistemological value, real-world context and a rewarding and enriching experience for both students and faculty. In this presentation, the steps involved in designing and implementing an interdisciplinary biology course (Biology II), and the results obtained, are presented. How the experience gained teaching this interdisciplinary course helped with teaching the regular (traditional) class and influenced the designing of OERs for the course, are also discussed.

York College & Queensborough Community College

12:00–12:25pm • A 106

Exploring Open Educational Resources for Precalculus (OP)

Virginia Thompson & Patrick Wallach (Queensborough Community College)

Textbooks have been an integral part of the college experience in teaching and learning for decades. Since 1977, their prices have increased more than 1000% which is bothersome. Too often, classes require students to purchase a textbook and/or an online homework access key with students going weeks, or the entire semester without being able to afford to purchase it. Because of this, higher educational establishments have started adopting Open Educational Resources (OER) in their courses, which provides zero cost textbooks for students. A typical OER course not only uses free textbook materials, but also research articles, videos, interactive assessment materials, simulations and more. Students can access these materials anywhere by a smart phone, tablet, or computer. Recognizing these benefits, individual faculty from York College and Queensborough Community College joined together, as part of the CUNY Collaborative Open Educational Resources in STEM (COERS) grant, to build OER capacity in their precalculus courses.

In this talk, each professor wishes to talk about (for each college): 1) their experience implementing OER in their courses, 2) student attitudes/opinions and overall satisfaction, including obstacles encountered learning in the OER sections, 3) the withdrawal rate for the pre-calculus course compared to the withdrawal rate for this courses in previous semesters when OER wasn't used, and 4) the results on the comparison of final exam scores for OER sections versus non-OER. Our efforts to explore the OER movement will join CUNY's drive to increase course conversions to OER throughout all its institutions.

12:00 PM – 12:55 PM Concurrent Sessions

New York City College of Technology

12:00–12:25pm • A 209

A "Playful" Approach to Teaching Abstract Concepts in Mathematics (IW)

Satyanand Singh

In the presentation, it will be shown how to use games to enhance learning in the classroom. In particular the presentation will illustrate in an interactive manner how to motivate and involve students in understanding abstract ideas in a mathematics class. This model has been used extensively by the presenter to teach mathematics at all levels with a high level of success. The presentation is readily accessible to a non-mathematician and illustrates a playful approach to teaching that leads to serious learning.

New York City College of Technology

12:30–12:55pm • A 103

Writing about Fashion (IW)

Nazanin Munroe

As a professor in Business and Technology of Fashion and a historian of dress and textiles, one of my primary goals is to educate students on how to analyze, describe, and contextualize fashion. Working with historic and contemporary garments from the 20th century, I have created scaffolded assignments educating students on the proper terminology of garment styles, aspects of clothing to include in a descriptive paragraph, and the appropriate elements of social and political history to help readers contextualize and appreciate fashion as an art form. Students also produce their own fashion drawings and describe the iconography, materials, and meaning behind their design choices.

New York City College of Technology

12:30–12:55pm • A 104

Capstone Project: Transforming Teaching into Learning (OP)

Asm Delowar Hossain

Students are often unable to picture the interconnection among the courses within a curriculum and their relevance to the professional world; therefore, in many cases, the materials taught in the class become a ritualistic exercise. Consequently, the students wish to merely survive the curriculum, rather than learn and benefit from it. Hence, teaching does not necessarily translate to learning. This dilemma can be addressed by allowing students to proactively take charge of their own learning in a controlled manner. A Capstone project is such an avenue; it allows the students to demystify the interconnections among the courses, establish a tangible link to the real world, foster independent thinking and attain a culminating academic and intellectual experience under the guidance of a faculty.

Stella and Charles Guttman Community College

12:30–12:55pm • A 104

Exploration and Uncertainty: The Space of Learning (IW)

Angela Dunne

Uncertainty is rarely thought of as a desirable state of mind. However, uncertainty is the state at the pinnacle of knowledge. The emphasis on mastery is detrimental to student success and motivation. I aim to show participants through practice, that students need the space to explore and embrace uncertainty in order to learn.

12:00 PM – 12:55 PM Concurrent Sessions

Brooklyn College

12:30–12:55pm • A 106

Orienting Our Software Engineering Students Towards Career Success (OP)

Devorah Kletenik

Sponsored by the CUNY Career Success Initiative, we aim to rework the Software Engineering course offered at Brooklyn College to improve gaps in students' knowledge of software engineering real-world practices. As the application of engineering to software development, software engineering includes the techniques and skills necessary to create code bases that are robust, reliable, and maintainable. All programmers who work on large code bases need to engage in strong software engineering practices to improve the reliability and efficiency of their programs. In bringing our Computer Science majors up to industry standards, we hope to improve our students' job prospects in the programming and software development sectors.

Our revised course includes an emphasis on experiential learning, including project-based learning and team learning. The course also incorporates guest lectures from industry professionals and collaboration with industry (including a team at Google) to develop the curriculum and projects. In addition to improving our students' technical skills, we also aim to improve their "soft skills," including teamwork and oral and written communication, and to involve them in projects that can be used to build a portfolio for job applications. We thus focus on a multi-pronged approach towards improving our students' career prospects.

This course was being piloted during the current Spring 2018 semester. We will reflect on student outcomes, success and challenges to provide guidance for others seeking a similar course redesign.

New York City College of Technology

12:30–12:55pm • A 106

Practical Design Discovery and Prototyping of an IoT Prosthetic Device (OP)

Gaffar Gailani, Yu Wang & Andy Zhang

The Internet of things (IoT) is increasing to almost every field of technology. However, this isn't necessarily true for amputees who have suffered a lost limb or hand and need their health status to be continuously monitored by caregivers. To solve this problem and to decrease the burden for amputees who must visit the doctor frequently, several bio-sensors such as the muscle, pulse, and temperature sensors have been implemented in our IoT-based prosthetic prototype. Our undergraduate research team at the New York City College of Technology designed a prototype of an IoT system for Myo-Prosthetics. The 3D printed prosthetic arm is designed to equip with servo motors or linear actuators that are controlled by microcontrollers. The data collected by the biosensors can be transferred to a Raspberry Pi from/to an online web application. The prototype has been designed to consider a more cost-effective, more stable, and more accurate. The students gain first-hand in-depth knowledge and practical experience in engineering project design. Through a collaborative learning approach to design and develop a real-life product, students with different backgrounds had the opportunity to learn to function effectively as a member or leader on a technical team.

New York City College of Technology

12:30–12:55pm • A 209

READ: A Strategy for Teaching Disciplinary Literacy in STEM and Professional Studies (PD)

**Nadia Benakli, Juanita But, Michael Gotesman, Ohbong Kwon, Kenneth Markowitz
Jason Montgomery, Robert Ostrom, Rachel Raskin, Estela Rojas & Chen Xu**

READ (Reading Effectively Across the Disciplines) at New York City College of Technology is a program with a primary goal to improve students' critical reading skills, disciplinary literacy, and academic success. It employs a multi-component design that consists of faculty training in disciplinary literacy instruction, development and implementation of active reading assignments and assessments, peer-led team learning, and the dissemination of discipline-specific teaching and learning resources on an Open Lab site to provide an interactive teaching and learning environment for students and faculty. The program's success relies on its model in which literacy specialists and content-area instructors work together to identify literary practices that are unique to each discipline and to embed literacy instruction into the content-area courses. In this panel, faculty from English/Reading, Accounting, Architecture, Biology, Computer Engineering Technology, and Mathematics will discuss strategies and practices that foster student learning of content knowledge and engage them in developing disciplinary literacy.

1:00 PM – 1:50 PM Lunch and Guided Tours

Lunch

Lobby Atrium and Mezzanine

Guided Tours

Guided tours of our laboratories led by student tour guides from the following departments:

- **Chemistry**

Eduardo Bravo
Xiaolan Wu

- **Dental Hygiene**

Saja Musa
Erika Robles
Jasmine Tejada-Ferreira
Rosie Torres

- **Nursing**

Elona Pocesta
Gabriella Yundleson

- **Radiologic Technology and Medical Imaging**

Kanij Fatema
Ryan Rowe

- **Restorative Dentistry**

Aneeza Hussain
Shane Velezart

- **Vision Care Technology**

Kasi Abujafar
Gokkaya Dursucan
Preston Lam

2:00 PM – 2:55 PM Concurrent Sessions

Borough of Manhattan Community College

2:00–2:50pm • Theater

Supplemental Instruction: A Powerful Tool for Enhancing Teaching Along with Student Learning, Engagement, and Success (PD)

Leslie Craigo, Johanes Familton, Susan Stratton & Janice Zummo

Over the past three years, Borough of Manhattan Community College has expanded the use of Supplemental Instruction (SI) to include over 80 courses each semester. Most recently, we partnered with the Teacher Education Department (TED) to provide SI in a high-risk course. Pass rates for this course usually fall below 70% making it a historically difficult course as defined by the Supplemental Instruction Program developed in 1973 by Deanna Martin at the University of Missouri, Kansas City.

All faculty and SI Leaders who participate in the SI program are asked to participate in SI training sessions, which are held prior to the start of fall and spring semesters. The introduction of TED allowed us to train a cohort of faculty and SI Leaders from the same discipline in the context of our regular SI training. TED faculty modeled promising teaching techniques for faculty and SI Leaders from other disciplines.

SI training sessions engage SI Leaders, faculty and SI supervisors at the table together to design out-of-class sessions and explore the difference between SI and tutoring, an SI Leader and a Teaching Assistant, and teaching and SI. Once the semester begins, students, faculty and SI leaders work collaboratively to develop independent learners. Using videos of SI sessions, interviews with SI Leaders and SI faculty, videos of classroom SI sessions, and data, this presentation will provide a model for Supplemental Instruction in diverse urban settings and serve as a framework for other institutions as they develop or continue Supplemental Instruction.

Lehman College

2:00–2:25pm • A 105

An Alternative to the Freshman Seminar for Returning Adult Students (IW)

Niki Fayne & Pam Hinden

The freshman seminar has become a standard offering in most colleges supported by data that these courses increase student persistence and success. Adult students, many of whom have been out of school for an extended period of time, often need similar support in their transition to college. The Adult Degree Program at Lehman College, with support from CUNY's Course Innovation Grant, is piloting such a course. IBA 135: Learning Inside and Outside the Classroom is a 3-credit writing intensive course focused on two related goals: how to succeed as a student, and how to succeed in one's career. Within these two goals, we focus on the following subjects areas: Learning Strategies, Use of Technology, Campus Resources, Personal and Career Development. The course culminates in a project in which the student creates a career portfolio.

The pilot includes three sections of 22 adult students each in Spring 2019 with three additional sections planned for fall. We are using "Teach Yourself How to Learn," by Saundra Yancey-McGuire as the primary course text, along with supplementary materials. In this presentation, we will share with you our rationale for the course, the course design, student feedback, initial outcomes, and lessons learned for future iterations. We will also have an opportunity to share ideas about what returning adult students need to increase the likelihood of success.

2:00 PM – 2:55 PM Concurrent Sessions

New York City College of Technology

2:00–2:25pm • A 103

Learning Places: Observing, Analyzing, Understanding New York City (PD)

Shuwen Chen, Bryan Gonzalez, Anne Leonard & Jason Montgomery

Students in the co-taught interdisciplinary course Learning Places: Understanding the City meet General Education learning outcomes through a series of place-based learning experiences and assignments that foreground the study of a specific place in New York City. Drawing on a shared orientation to the site chosen for study from documentary films, site visits, reflections on their own experiences as urban dwellers, and focused research visits to archives and special collections, students learn not just about New York City but more importantly how to observe, how to construct meaning from observation, and how to verify data gathered through empirical study. Students conduct empirical studies of the chosen place and then analyze the evidence they gather through research in archives, special collections, and demographic and geographic data. After documenting their observations and documentation (including photographs and sketches) in a site report, students use a range of research methods to draw further meaning from their empirical study, which they apply to their research throughout the semester. The site report launches students into the process of meeting a specific General Education learning outcome: Using skills in inquiry and analysis to derive meaning from experience as well as gathering information from observation. In this presentation, instructors and a few current students (schedules permitting) will offer their perspectives on learning from studying one New York City place through place-based empirical observation and analysis of a range of historical and contemporary primary sources.

Queensborough Community College

2:00–2:25pm • A 104

Academic Service Learning Project Provides Students with Actual Work Experience (IW)

Sebastian Murolo

A High Impact Service Learning Project is titled “The Business of Entertainment.” It is a collaboration with Queensborough Performing Arts Center (QPAC). Students meet several times during the semester including a meeting with the Executive Director of QPAC who provides the students with hands-on experiences to help them prepare a projection of the Income Statement for a show provided by QPAC. They go to the show at no charge. After the show, we are provided with the actual income statement. The students analyze the dollar and percentage differences using an Excel spreadsheet. The students perform vertical analysis and profitability ratios on the actual income statement which is part of the Syllabus in the Accounting Course the students are in. Finally, this analysis is provided to the QPAC Director. As the QPAC Director has told my Business students, “They call it Show Business for a reason. It is 90 percent business and 10 percent entertainment.”

Kingsborough Community College

2:00–2:25pm • A 104

Economic Experiments at Kingsborough Community College: Learn within the classroom by Re-Creating the “Beyond Classroom Walls” Economic Institutions to Improve Learning and Attitudes about Economics (OP)

Dorina Tila

Experimental economics, for which Vernon Smith won the Nobel Prize in 2002, has been a relatively new research focus for economists to test the validity of economic theories by using experiments. Could such experiments be useful in a classroom whereby, although teaching is done within the classroom walls, running such economic experiments provides the perception and learning “beyond classroom walls” because of the re-creation of the world and economic institutions within the classroom? Classroom experiments are defined as setting up an economic environment whereby students will make decisions and have a first-hand experience of how their decisions and interactions with others create the market forces and eventually the results predicted from the economic theory. This presentation will share a case study of some basic economic experiments designed and integrated in a Principles of Microeconomics course at Kingsborough Community College during Fall 2018. This new pedagogical tool that re-creates the outside world within the classroom showed that: 1) improvement in students’ attitudes towards the subject (i.e., economics), 2) engagement and perceived improvement in learning, and 3) increase in scores of assessments for the material covered by economic experiments.

2:00PM – 2:55 PM Concurrent Sessions

New York City College of Technology

2:00–2:25pm • A 106

Developing Discipline Specific Literacy for Law & Paralegal Studies Students: LibGuides as Transitional Tool (OP)

Kimberly Abrams & Marissa J. Moran

Developing LibGuides for Law and Paralegal Studies students at New York City College of Technology arose from the following question: How do we change the way Legal Studies students think of the Library as a resource to better assist them in their transition to college level-research and a future career as a paralegal? At the heart of this question is the importance of discipline-specific information literacy at the college and professional levels. Many students have difficulty with locating relevant information to complete course assignments partly because library resources are both fragmented and cohesive. Thus, while part of the transition to college level research is to learn to utilize the library, it is important to help students focus their research through discipline-specific LibGuides that cut through the noise of OneSearch and to provide a coherent and discipline-specific research strategy.

The LibGuide was tailored to the Law and Paralegal Studies program and provides targeted access to legal texts, articles, videos, tutorials, and links to professional organizations/associations, and databases. The intention of this guide is to provide a central destination where students can get more information about legal research and professional development.

Law and Paralegal Studies students were introduced to the initial LibGuide in their classes and there was a question and answer session following the demonstration. Thus information literacy is embedded throughout the Law and Paralegal courses to assist in the transition from introductory courses to advanced disciplinary research and career planning.

Hostos Community College

2:00–2:25pm • A 106

Supporting Students as Critical Readers (OP)

Sarah Church & Linda Miles

Supporting students working on assigned research projects, librarians tend to focus on the early stages of the process, connecting students with information sources, and classroom faculty typically address writing and revision in the latter stages. Professors Miles and Church, a librarian and classroom instructor, respectively, shared with each other the struggles they saw evident in the questions asked at the reference desk and in the research papers submitted. They realized that what students really needed was support for something that had largely been left out of the equation: critical reading. Students don't necessarily come to college ready to navigate academic and scholarly documents, focus on what's important, pull out the information that matches their need, and ask questions of the material based on prior knowledge and an informed worldview. They need to learn these strategies and practice them.

During Fall of 2018, the two professors designed a sequence of critical reading/writing activities, based in part on the work of Steven Pearlman and David Carillo of The Critical Thinking Initiative. Professor Church piloted the sequence in two sections of Foundations of Early Childhood Education, integrating them into the course's cornerstone research assignment. This presentation will feature a discussion of the critical reading challenge that many new college students face, the design of the critical reading/writing sequence, the collaborative development of this pilot, initial assessment of outcomes for Fall 2018 students, revisions enacted in Spring 2019, and next steps for the initiative.

2:00 PM – 2:55 PM Concurrent Sessions

New York City College of Technology, Laguardia Community College & Baruch College

2:00–2:25pm • A 209

Circling Back to Students: Strengthening Open Education Initiatives by Privileging Student Perspectives (PD)

**Cailean Cooney, Ian McDermott, Christopher McHale (Laguardia Community College)
Pamela Thielman (Baruch College)**

Panelists will present three distinctive approaches to incorporating student perspectives into our respective OER initiatives at Laguardia Community College, Baruch College, and New York City College of Technology. To this end, our subject cuts across two questions up for discussion this year: Who is at the table? Learning for all, and Where is the Public Discourse? Learning in the Open. Panelists from Laguardia will introduce their initiative, a student driven open textbook review project where, through a paid internship, students partner with faculty on a textbook review project with the goal of increasing student awareness of OER and to empower them as advocates in their education.

Baruch College will present their student survey instrument and how their findings have become instrumental to developing student-centered recommendations for faculty involved in teaching with ZTC/OER course materials. New York City College of Technology (NYCCT) will describe a study initiated to test the usability of OERs developed through the college's OER initiative, with the dual purpose of making more visible connections about how student experience and perspectives can amplify their faculty professional development program.

Participants will outline the goals and outcomes of these initiatives - implicit and explicit - and share practical strategies to recenter students as a vital part of the conversation when it comes to pedagogical initiatives, both in principle and as an overall feedback loop to inform and adapt our approaches to OER programming with our college communities.

Lehman College / New York University

2:00–2:25pm • A 406

Cinema and the Language Classroom: Why? How? Where? (OP)

Guillermo Severiche

Although new technologies and streaming services have developed in the past years, cinema remains as a highly applicable but also challenging pedagogical tool. New studies keep encouraging instructors to use film in the classroom – more specifically, film clips – in order to focus on language use, cultural representations, and aesthetic values. The popularization of services such as Kanopy or the UC Berkeley's Lumière has brought new forms to incorporate cinema as part of language instruction. However, what are the possibilities of cinema as a pedagogical tool beyond the classroom?

This presentation provides not only a wide perspective on studies regarding the use of film in language learning, but it also showcases different activities that work with cinema outside the classroom. More particularly, it collects a variety of activities performed by L2 and Heritage Speakers students of Spanish in intermediate and advanced courses. By following experiential learning and task-based methodologies, these activities encourage students to view cinema as a space for creative sourcing, social exchange, and political discussion while learning or reinforcing skills in Spanish. In these activities, students attend screenings followed by a Q&A with the filmmaker, watch film clips in order to hold online conversations with English-learners in Argentina, or visit the Bronx Documentary Center and gather ideas for personal writing. Whether the final outcome is a video blog, a brochure, or a non-fiction piece, these activities consider cinema as a dynamic source with innumerable opportunities to develop critical thinking and creativity using the target language as means of communication.

2:00 PM – 2:55 PM Concurrent Sessions

New York City College of Technology

2:00–2:25pm • A 409

ID Matters at City Tech: Perspectives on General Education Interdisciplinary Courses (PD)

Amanda Almond, Tamrah Cunningham, Reneta Lansiquot, Sean MacDonald, Laureen Park & Robert Walljasper

Our research has demonstrated the positive effect of interdisciplinary studies, including the skills that interdisciplinary teaching cultivates: to purposefully connect and integrate across-discipline knowledge and skills to solve problems; to analyze how complex problems result from the interaction of a variety of social and natural processes; to apply integrative thinking to problem-solving in ethically and socially responsible ways; to recognize varied perspectives; and to think critically, communicate effectively, and work collaboratively. These are critical skills, which will prepare students to join a diverse twenty-first century workforce, while challenging faculty to incorporate multiple perspectives and promote research-based collaborative learning.

At New York City College of Technology, all baccalaureate students are required to complete one interdisciplinary liberal arts and sciences course, which must be team-taught by two or more faculty from different disciplines. We have found that participation in interdisciplinary studies has had a positive impact on faculty scholarship. We will discuss areas for fostering interdisciplinary co-teaching, namely, student evaluation of teaching and faculty compensation. We will also examine the success of our Ad-Hoc Course Integrity Working Group. To this end, this panel will highlight the good work being done by faculty across our three schools: Arts & Sciences, Technology & Design, and Professional Studies. Panelists will provide their perspectives on team-teaching; connecting interdisciplinary studies to other high-impact educational practices such as virtual place-based learning and game-based learning; and how interdisciplinary collaboration promotes faculty scholarship, specifically, presentations and publications.

Baruch College

2:00–2:25pm • A 506

An Assessment Strategy for SEEK Math Outcomes (IW)

David Rosen

Assessment is critical to highlight the successes of our programs and to learn more about the areas where we need to improve. At Baruch College, SEEK has developed an assessment strategy to learn more about our students' success rates in the highly challenging pre-business math courses at the college.

Over the past three years, we have compared pass, fail and withdraw rates of SEEK and regularly admitted students for key math courses by semester. We are able to see how our students perform compared to non-SEEK students in the same courses each semester and to SEEK students in prior semesters. We also compare how our students do in the fall compared to the spring. Through these analyses, we have learned that SEEK students at Baruch College outperform regularly admitted students at the college in challenging math courses on average and in most of the key courses.

2:00 PM – 2:55 PM Concurrent Sessions

New York City College of Technology & Borough of Manhattan Community College

2:00–2:25pm • A 517

Opening Gateways:

Supporting Success in STEM through Success in Gateway Mathematics (IW)

Charlie Edwards, Laura Ghezzi, Andrew Parker, Jonas Reitz, Jenna Spevack & Annie Han (Borough of Manhattan Community College)

“Opening Gateways to Completion: Open Digital Pedagogies for Student Success in STEM” is a 5 year collaborative grant between the New York City College of Technology and the Borough of Manhattan Community College funded through the Department of Education’s Developing Hispanic-Serving Institutions (Title V) program. The project supports student success in mathematics courses that serve as gateways to STEM disciplines, courses that often act as barriers to progress and completion in these disciplines. Cohorts of full-time and part-time faculty from both campuses take part in an intensive professional development seminar, where they are exposed to active learning strategies, open digital pedagogies, Inquiry Based Learning practice, multiplayer and flipped classroom techniques, games in the classroom, WeBWorK, Desmos and much more.

An ecosystem of high-quality OERs support the pedagogy of our participants. WeBWorK, an open source alternative to expensive and proprietary online homework systems, serves as a platform for the development of problems and problem sets aligned with the curriculum, with customized feedback and error-recognition. At New York City College of Technology, additional development has bridged WeBWorK and the OpenLab: students seeking help on WeBWorK are directed to an OpenLab community space where they can ask and answer questions. Classroom activities and STEM applications developed by our participants, and a curated collection of resources such as online videos, round out our OER ecosystem.

Join us to learn more about our professional development model and see first-hand some of the exciting OERs, activities and STEM applications developed and utilized by our participants for Algebra and Precalculus courses.

Kingsborough Community College

2:30–2:55pm • A 105

Shifting Growth Mindset to Turn Teaching into Learning: A Case Study at Kingsborough Community College (OP)

Dawn Levy & Dorina Tila

A pre-requisite for turning teaching into learning is a motivated learner. A study conducted at Kingsborough Community College during 2018 investigated how incentivizing students to revise and resubmit their work would affect their performance and leadership abilities. Improvements in student performance and leadership abilities were evaluated through: 1) students’ perception of what they considered learning and improvement; and 2) students’ mindset growth profile. A growth mindset also contributes to persistence and completion among community college students. Our findings show that the representative sample of community college students exhibited a type of mindset that is at margins between fixed and growth; they are “...unsure whether [they] can change [their] intelligence...and don’t want to really have to work hard...” This revelation highlights the importance of the task that faculty and community colleges have to find ways of shifting towards a growth mindset. This is the key to nurturing success, completion and emergence of future leaders.

2:00 PM – 2:55 PM Concurrent Sessions

Queensborough Community College

2:30–2:55pm • A 106

Using Global and Diversity Learning to Teach about Disease Outbreaks (OP)

Christopher Roblodowski

Global and Diversity Learning (GDL) is one of the AAC&U's High Impact Practices. Its goal is to provide students with a framework for exploring multiple perspectives on viewing our interdependent world. This presentation explores the implementation of GDL in a microbiology course at Queensborough Community College. The GDL avenue explored by this project is intercultural learning and global citizenship. Students work in groups to research a current disease outbreak, chosen by them from a list of outbreaks. They submit reports that include background information into the outbreaks as well as an examination of factors that have led to the spread of this outbreak from multiple perspectives. The perspectives include patient, physician, government official, family member, pharmaceutical company representative, among others. For the final assignment, students prepare a group presentation to share their findings with the class. Students fill out surveys at multiple points in the semester to gauge their understanding and engagement with their course material. Some student samples will be displayed during the presentation.

Hostos Community College

2:30–2:55pm • A 106

Infusion of a QR Exercise into NUR228 Pediatric Hybrid Course (OP)

Kathleen Ronca

My QR goal was to have my pediatric nursing students be able to think critically while applying basic mathematic and statistical skills to interpret data, solve problems and draw conclusions. I wanted my students to be able to draw a conclusion and explain the results and support their findings. In order to accomplish this, students were assigned to graph the susceptibility of E. Coli bacteria to antibiotics based on a provided table of culture results. Students were asked to show bar graphs and explain which antibiotics are best and why. The students were instructed to do the assignment in either MS Word or MS Excel and submit the file to Blackboard. The QR learning goals which I set were met and the results exceeded expectations. All students understood the information and correctly interpreted the data provided in the table. On completion of the task students were able to select and analyze data from urine culture and sensitivity reports, make appropriate quantitative calculations and explain the use of antibiotics for urinary tract infections based on an informed opinion. All 34 students in the class estimated and evaluated the validity and reasonableness of results correctly. All of the students effectively communicated quantitative concepts using standard written English and correct mathematical syntax.

2:00 PM – 2:55 PM Concurrent Sessions

John Jay College of Criminal Justice

2:30–2:55pm • A 209

Using Problem-Based Learning to Transform Learning into an Innovative, Reflective, Interactive Experience (IW)

Iralma Pozo

To better prepare students for the innovative digital workplace of the future, educators should strive to extend learning objectives beyond those imposed by course descriptions, textbooks, and curriculum. One of the many ways to do so is by using problem-based learning in class. During the 2018-2019 school year, I have been participating in TLC PBL seminar at John Jay College of Criminal Justice. My goal was to learn how to make the accounting courses I teach more interactive and to learn new ways to have students apply the subject material in ways that allowed them to take ownership of their learning. Problem-based Learning (PBL) has helped me accomplish this and more.

Brooklyn College

2:30–2:55pm • A 406

Some Observations on Observations: Repairing Our Dysfunctional Relationship with Peer Teaching Evaluations (IW)

Parbatie Chitolie, Graciela Elizalde-Utnick & Sharona Levy

Teaching observations are a contractual requirement and an important component in assessing part-time and full-time faculty for rehiring, promotion and tenure. They are also an opportunity for faculty development and teaching effectiveness. But how often do we, whether observer or observee, really see peer observations as an opportunity rather than an obligation—and a fraught one at that? At Brooklyn College multiple departments have been going through a process of redesigning their teaching observation forms or procedures for conducting teaching observations. These attempts reflect the desire to reclaim a formative assessment that has been awkwardly co-opted into a summative one. In this highly interactive workshop, participants will explore the strategies and evaluation criteria used in peer observations. Presenters will share the results of a peer observation form analysis project at Brooklyn College and describe a more productive approach to teaching observations. Participants will engage in a mini-process of assessing the assessment tool and come away with sample observation forms and a deeper understanding of how to make the peer observation process more meaningful and a tool for departmental conversations around teaching effectiveness and student learning.

Kingsborough Community College & Lehman College

2:30–2:55pm • A 409

“But how do students feel about it?”: The CUNY Student Zero Textbook Cost Course Survey (OP)

Shawna Brandle & Stacy Katz (Lehman College)

To increase adoption of OER (Open Educational Resources), OER supporters often focus on making the financial case for OER: we compare student financial need against skyrocketing textbook prices. Yet the students' perspective is often missing from the discussion: how do they actually feel about the OERs that are being adapted for their classrooms? There is a growing body of literature that says students using OERs perform as well or better as students using traditional course materials, and that students believe that the OERs are just as good or better than traditional course materials (Hilton et al., 2014, Fischer et al., 2015) but these studies have largely been conducted at institutions with very different student profiles than CUNY, whose student body is 44.8% First Generation in College, 38.8% native speakers of languages other than English, and 42.2% from households with an annual income of \$20,000 or less. To ensure student perspectives stay centered, we conducted a cross-campus survey to see how CUNY students feel about OER, in terms of access, quality, and how they engage with their materials. In this presentation, we share our results and analyses of the first two semesters of the survey, as well as the lessons learned from putting the survey together.

2:00 PM – 2:55 PM Concurrent Sessions

College of Staten Island

2:30–2:55pm • A 506

CSI Math Immersion: Balancing Student Success and Cost Effectiveness (OP)

Chrisanthi Anastopoulou & Koby Kohulan

For the past fifteen years, the Office of Academic Support (OAS) at the College of Staten Island (CSI) has offered various Immersion programs in math (high-fail & low-fail students), reading and writing (EPL and ESL). During all these years, OAS has changed the number of total instructional hours, days of instruction, and the hours of instruction per day to find the best set of parameters that result in the highest passing rates of students.

Anecdotal observation of the academic performance of the low-fail math students had convinced us that 70 hours of instruction led to the greatest numbers of students passing their math Immersion courses. Last year, based on CUNY's recommendation, we offered a new Immersion class with fewer instructional hours. This presentation will be an overview of CSI's math offerings for low-fail students in both Winter and Summer Immersion programs. The analysis of outcomes data for the past six years revealed which instructional model best balance student success and cost-effectiveness. Interestingly, while performing this analysis, we were surprised to see a clear distinction in the relationship between the number of instructional days offered and student passing rate of the class. These new findings will be shared with the participants in hopes that it may inform program decisions for other colleges.

New York City College of Technology, Macalester University, University of Virginia and
ASCN and Western Michigan University

2:30–2:55pm • A 517

Accelerating Systemic Change Network: Demonstrating Impact (OP)

**Pamela Brown, David Bressoud (Macalester University), Archie Holmes (University of Virginia)
Kate White (ASCN and Western Michigan University)**

The Accelerating Systemic Change Network (ASCN) is an interdisciplinary professional network for practitioners and educational researchers who are working towards positive change in higher education. The goal is to accelerate discovery of research-based knowledge, its dissemination and implementation. ASCN is open to all and includes network members, working groups, a steering committee and a network hub. Working Group 4 has focused its efforts on "Demonstrating Impact: How can measurement and communication be used to promote change?" Its mission is to "identify, explain and disseminate information on metrics that hold the potential to document, foster, accelerate and communicate systemic change." The group's most recent work has focused on the recently released National Academies of Sciences, Engineering and Medicine "Indicators for Monitoring Undergraduate STEM Education," which outline a framework and set of indicators that document the national condition and effectiveness of undergraduate STEM education. Members of ASCN were asked to indicate their experience with these indicators and identify which they need to measure, measurement tools that they were aware of that could be used to address these indicators and which indicators need measurement tools to be developed. Responses were evaluated and suggest that there are three areas for which there is a need for the development of assessment tools, five areas where tools exist but there is a need for improved measurement tools and three where satisfactory measurement tools exist. A follow-up survey is in progress for additional feedback on whether these are the correct priorities and audience. This presentation will highlight work to date, future plans and how you too can get involved with ASCN. To learn more about ASCN see:

<https://ascnhighered.org/ASCN/about.html>

3:00 PM – 3:55 PM Concurrent Sessions

New York City College of Technology & CUNY Graduate Center

3:00–3:50pm • Theater

Using WAC Pedagogies to Support Student Learning (PD)

Alicia Andrzejewski, Samuel Gold, Samar El Hitti, Laura Malhotra, Heather Mir & Denise Sutton

Current WAC coordinators and fellows, alongside faculty members who are completing their Writing Intensive certification, discuss specific strategies for applying Writing Across the Curriculum pedagogies in classes across disciplines. Included in this discussion will be various strategies that employ the writing-to-learn pedagogy, which privileges the acquisition of course content over grammatical perfection in informal writing assignments, and ways in which such assignments can help students write more effective formal papers. This panel will feature activities as well as presented material, with time for audience discussion.

Kingsborough Community College, CUNY Urban Food Policy Institute & Brooklyn College

3:00–3:25pm • A 105

Communities Twice Over:

Fostering Civic Engagement among Urban College Students (IW)

**Tanzina Ahmed, Cris Izaguirre, Maya Stansberry, Glenda Ullauri
Rositsa Ilieva (CUNY Urban Food Policy Institute) & Anita Yan (Brooklyn College)**

It is important for college students to experience civic engagement within their time in higher education, given the benefits that civic engagement brings to their understanding of the world (Finley, 2011). However, the civic engagement activities that students undertake must be tailored to their needs, as well as resources of the institutions they attend. Traditional civic engagement strategies for college students have often involved their volunteering and taking part in service-learning opportunities off campus (Purce, 2014). Given the economic and social difficulties that urban college students often experience, it may be more appropriate to help them connect to and engage with resources on campus that can support them and their fellow students (Better, 2016; Murphy, 2014). Furthermore, this form of civic engagement can be coupled with reflective research activities to help students develop their research and critical thinking skills (VanOra, 2016). This presentation explores the importance of connecting urban college students to civic engagement opportunities on campus and offers examples of campus- and community-based civic engagement projects that take place within the context of CUNY Kingsborough Community College. After reviewing civic engagement projects taking place within Kingsborough's Urban Farm and its Psychology sub-program, the presentation concludes with suggestions for civic engagement projects that can be adapted to suit the goals, purposes, and campus resources of other colleges.

New York City College of Technology

3:00–3:25pm • A 103

Learning to Teach: Using Educational Methodology to Improve Faculty Calibration in the Dental Hygiene Curriculum (OP)

Maureen Archer-Festa, Maria-Elena Bilello, Joycelyn Dillon, Anna Matthews & Susan Nilsen-Kupsch

In 2015, in collaboration with the New York City College of Technology's Faculty Commons, we organized a Dental Hygiene Educational Methodology Committee (DHEMC). The goal of this committee is to provide educational methodology opportunities to all full-time and part-time faculty members of the Dental Hygiene department. This ensures compliance with the accreditation requirements of the Commission on Dental Accreditation (CODA).

We began a series of annual workshops, focusing on research-based educational approaches to enhance student learning and improve faculty calibration. Each of the four workshops conducted since 2015 focused on one of the specific principles of learning discussed in the textbook "How Learning Works" (Ambrose, et al., 2007). To date, the topics that have been examined include the role of faculty feedback, course climate, and student motivation in their learning, as well as the process of development of mastery by students.

The effectiveness of the faculty training and calibration in educational methodology has been confirmed by the findings of our study (Matthews, et al., 2017). We evaluated the change in faculty written feedback practices following the DHEMC workshop of 2015. Our results demonstrated that faculty members increased their written feedback and improved it by including goal-targeted strategies for students to facilitate the development and improvement of their clinical skills.

We will discuss the organization and effectiveness of the Dental Hygiene faculty development program. Participants will learn how this approach can be adapted to various educational programs, especially in disciplines where faculty development in educational methodology is required by the accrediting organizations.

3:00 PM – 3:55 PM Concurrent Sessions

Hostos Community College

3:00–3:25pm • A 104

How a WI Microbiology Course Can Help Students Wanting to become Health Practitioners Evolve into Effective Community Leaders (OP)

Julie Trachman

Writing Across the Curriculum (WAC) initiative proponents, including CUNY, recognize that as students are encouraged to develop their communication skills in a course setting they are forced to explore that course material at a deeper level and more likely to engage in critical thinking. Those of us in the STEM disciplines are increasingly aware of just how critical it is for us, including our graduated students, to do better at communicating to the non-science populace how we go about developing our scientific knowledge and conveying how this evidence-based information can be used to shape public policy.

For many years, I have been teaching a writing intensive (WI) microbiology course with most of my students being pre-Allied Health Sciences students or science majors. In teaching this WI microbiology course, numerous writing assignments have been designed which help students delve more deeply into the microbiology discipline and make them more cognizant as to how the book-learned knowledge correlates to real life situations. Scaffolding of assignments help students process the information so as to give the wealth of information more coherence and context. Some assignments such as a blog-based assignment performed near the course end are designed with the aim of making the students better health practitioners when they finish their studies but make it also possible for students to become effective at reaching out to their communities on health issues even while they are Hostos students. In this presentation, I will describe several of these assignments and their outcomes.

Queens College

3:00–3:25pm • A 106

Teaching for Student Success: A Faculty Discussion Series (OP)

Michelle Fraboni & Rachel Stern-Lockerman

The purpose of this work is to shift the nature of faculty development from that which is completely faculty-focused to one that considers the link between what faculty do in their classrooms and student learning success. Ultimately, we aim to go beyond the traditional view of faculty development, which is often focused on learning new technological tools or developing targeted skills for teaching, to one that is focused more on student-centered learning, enabling faculty to implement small student-focused changes in their classrooms and become more aware of students and who they are as learners.

Based on the Bridging the Gap series developed by CUNY Centers for Teaching and Learning, the Queens College CTL recently launched “Teaching for Student Success,” a discussion series focused on understanding the key factors of student-centered learning. Guided by *How Learning Works: Seven Research-Based Principles for Effective Teaching* (Ambrose et al, 2010), 36 faculty are meeting 8 times throughout the semester to consider key aspects of student-centered learning. Anchored in a Google Classroom environment, participants respond to readings and explore supporting tools and concepts related to the HLW learning principle for a particular session.

Faculty have identified new pedagogical approaches or strategies that can be implemented in their courses. They will be sharing their experiences face-face and online throughout the semester and will present their work at the Queens College CTL Teaching Showcase.

We will report on faculty feedback about the series, their classroom experiences, as well as pre- and post- participation surveys.

3:00 PM – 3:55 PM Concurrent Sessions

New York City College of Technology & Columbia University

3:00–3:25pm • A 209

“Our Stories” Developing a Virtual Community of First-Year Voices (IW)

Sandra Cheng, Mery Diaz, Karen Goodlad, Ashwin Satyanarayana, Jennifer Sears & Philip Kreniske (Columbia University)

First Year Learning Communities (FYLC) at New York City College of Technology is structured to provide first-year students in linked courses an interdisciplinary learning experience. This approach creates opportunities for students to form bonds within the college community. A shared belief among faculty leaders in the potential for writing to transform the student experience led to the development of the “Our Stories” digital writing project. “Our Stories” offers FYLC students the opportunity to express their experiences in classes, seminars, lectures, study groups, and labs on the OpenLab, a digital platform for teaching, learning, and sharing. Through this project, students shared their stories and revealed an institution with a large immigrant population, evoking questions of vulnerability, cultural adjustment, and unspoken uncertainties about college life.

During a two-part interactive workshop, we will utilize reflective writing to engage the audience, and participants will review “Our Stories” narratives to inform the conversation around the challenges in the transition to college. We seek to amplify the diverse voices of our first-year students into participants’ conversations and thought processes with emphasis on first generation and diverse populations. Through this process we intend to develop a sense of how we as educators and administrators can support the student transition to college and reveal the need for continued advocacy and funding to develop innovative programs to support diverse students emotionally, economically, socially, and academically.

New York City College of Technology

3:00–3:25pm • A 406

The Classroom Community of Inquiry: Facilitating Metacognition in Class Discussion Across the Curriculum (IW)

Steven Bear

The Community of Inquiry's metacognitive, dialogical, critical thinking approach to the questioning and understanding of course content is productive and empowering for all members of the learning community, students and instructors alike. By applying a method that explicitly facilitates the development of good critical thinking habits in the context of discussing and understanding course material, students think independently and interdependently to enhance their intellectual approach to learning and increase their confidence as learners, as they better understand course content. Faculty may achieve keener insight into students' thinking, and conceptual and detailed comprehension, allowing for more productive use of review and instruction time. This method may be effectively applied to any subject, so long as students may (in person or online) meet to discuss course content to improve their comprehension.

The WRAITEC method of classroom dialog facilitation will be introduced, explained, and demonstrated with the participation of attendees. The acronym stands for What are we talking about, Reasons, Assumptions, Inference, Truth, Examples, and Counter-Examples. Methods of soliciting student questions followed by dialog facilitation strategy designed to emphasize the application of WRAITEC elements to classroom discussion will be articulated. There will be much time for questions, demonstration, and dialog. I have used this method with all ages, with students and faculty from around the world, in my Developmental Reading and Writing classes in CUNY, and in distance learning format teaching interdisciplinary global studies and Philosophy at Farleigh Dickinson University.

3:00 PM – 3:55 PM Concurrent Sessions

Hostos Community College

3:00–3:25pm • A 409

Summer Research Seminar: A New Approach to Student-Faculty Research (OP)

Sarah Brennan, Silvia Reyes & Lisa Tappeiner

Formal collaboration between student and faculty on research has been identified by the AAC&U as a High Impact Practice. However, student-faculty research is challenging in a community college setting, where students are still developing foundational knowledge in their majors, and faculty carry a heavy teaching load. In order to increase research opportunities for students, Hostos Community College developed a Summer Research Seminar (SRS) through a grant-funded initiative. This session describes an extra-curricular research experience for community college students that develops information literacy and research skills in a seminar setting.

SRS is a seven-day intensive summer program designed to introduce students to the fundamentals of academic research by exposing them to varied research settings and engaging in activities designed to develop critical information literacy skills. For the past four summers, a group of 5-10 Hostos Community College students from varied academic backgrounds have attended a week long seminar to research a question of their choosing and produce and orally present a critical annotated bibliography. Participants build skills in asking researchable questions, academic resource discovery, and critical reading of research articles. Students also visit labs and speak to researchers at a major research institution. Skills acquired in this seminar are transferable across a range of academic and professional contexts.

Session facilitators will discuss how and why they adapted the model of faculty-student research to research seminar setting. We will present the curriculum and assessment activities. Finally we will address logistics, successes and challenges, student learning, and program assessment.

Queens College

3:00–3:25pm • A 506

From Learners to Leaders (IW)

Ying Zhou

In this workshop, we will explore the definitions of a learner and a leader and introduce the concept of a collective. We will share what we learnt through several learning projects, transforming students to learners, and then to leaders. The problem we try to tackle is stated as: "How might we motivate our students to take ownership of their learning, and apply what they learn to create value for themselves and for others?" We will discuss the following topics in more detail and share how we implemented each: Tech collectives, students as teachers, students as facilitators, students as leaders.

3:00 PM – 3:55 PM Concurrent Sessions

Brooklyn College

3:00–3:25pm • A 517

Investigating Money Priming in Educational Games: Our Research in the Classroom Experience (OP)

Devorah Kletenik

We report on our attempt to bring "research in the classroom" by incorporating an original research experience into an undergraduate course. Undergraduate research is linked to enhanced critical thinking and communication skills, increased student retention and increased continuation to graduate school; thus integrating research into the classroom grants an entire class of students access to the research experience and its potential benefits.

We integrated research into the effects of the representation of scores in educational games into the Game Programming course at Brooklyn College. A variety of psychological experiments showed that subtly reminding participants ("priming") of the notion of money changes their actions and attitudes, increasing their effort and persistence. In the course, we discussed the literature and hypothesized that these results would extend in an educational game context, i.e., that the use of monetary tokens (e.g. coins) to represent scores may change player engagement, motivation, and/or the educational outcome. Throughout the course, students explored this research question. They worked in groups to create educational games that were both fun to play and provide a learning experience. They added multiple modalities of score representations and observed the effects of the representations on player educational gains.

In this work, we report on both the outcome of the research project as well as the outcomes of the research experience for students. We discuss both the challenges and successes of integrating research in the classroom and lessons for the future.

This work was sponsored by a CUNY Research in the Classroom award.

Hostos Community College

3:30–3:55pm • A 105

Examining Digital-storytelling as a Pedagogical Tool for Ethnic Minority Immigrant Community College Students (OP)

Sarah Ahmed, Stacey Cooper, Johanna Cruz & Donakaye Taylor Gilliard

This research project proposes that embracing immigrant cultural knowledge in classroom practices creates more inclusive and transformative learning practices, and has the potential for fostering transformative learning identities. Undergirding this premise is the idea that Ethnic Minority Immigrant (EMI) students bring with them into learning spaces, unique cultural knowledge and resources that if recognized and validated can then become the basis for creating culturally responsive learning tools. Additionally, this presentation argues that using students' cultural and experiential knowledge is a basis for producing more representative teaching modules that are culturally responsive to the needs of immigrant students.

In this presentation, student researchers will present their research findings from the current study and report on their experiences as student researchers. This presentation draws on data from a qualitative and participatory research study that examined community college students' use of digital storytelling to critically examine and problematize their everyday immigrant and academic experiences, and reports on examples of student-generated and culturally-aligned pedagogical tools.

3:00 PM – 3:55 PM Concurrent Sessions

New York City College of Technology

3:30–3:55pm • A 103

Incorporating Metacognitive Strategies to Promote Success of Technology Students (OP)

Navid Allahverdi, Claudia Hernandez, Melanie Villatoro & Chen Xu

New York City College of Technology is the designated senior college of technology within the 24-unit City University of New York (CUNY). The college plays an important role nationally in the education of future engineers and technologists by offering a broad range of engineering technology majors. These majors have high enrollment annually; however, one-year retention rates of engineering technology students are typically 10-20% lower as compared to their peers at the college. How can we, as faculty, transform teaching into learning for our students and give them the tools to excel in their college coursework? According to Saundra McGuire, "If you teach students how to learn, and give simple, straightforward strategies to use, they can significantly increase their learning and performance."¹

This study looks to examine whether McGuire's strategies can be replicated for students enrolled in Architectural Technology (ARCH), Electromechanical Technology (EMT), and Construction Management and Civil Engineering Technology (CMCE). The methodology is based on McGuire's recommended practices with adaptations for a range of technology courses. Our study aims to identify whether there is a correlation between grade performance and exposure to metacognitive strategies. The results can provide a template to be utilized across technology courses with historically poor student performance and in turn low retention rates. As the nation's employment needs for engineering and technology workers increases, it is important that we focus on student learning to promote successful retention and graduation.

¹McGuire, S., & Angelo, S. (2015). *Teach Students How to Learn: Strategies You Can Incorporate Into Any Course to Improve Student Metacognition, Study Skills, and Motivation*. Herndon: Stylus Publishing.

New York City College of Technology

3:30–3:55pm • A 104

A Non-traditional Training Program Designed to Diversify the Geoscience Workforce (OP)

Reginald Blake, Janet Liou-Mark, Hamidreza Norouzi, Julia Rivera & Laura Yuen-Lau

A recent report by the National Academies of Sciences, Engineering, and Medicine (2019) describes how minority-serving institutions are not widely targeted and included in the production of future STEM workers. However, in order for the United States to remain competitive and to, more importantly, replenish its depleting STEM workforce, particularly in the geosciences, the inclusion and engagement of minority students are critically essential. As a Hispanic-serving institution, the New York City College of Technology with funding from the National Science Foundation has developed an intensive one-year geoscience workforce program to train non-geoscience majors for the geoscience workforce. The program exposes minority STEM students to the geosciences through an interdisciplinary course, and it prepares them for the geoscience workforce through a series of mini geoscience workshops. Additionally, the program creates an apprenticeship component via a semester-long research project, and it culminates with a summer geoscience workforce internship experience with its geoscience industry partners. Results from a three-year study of the program show that minority STEM students: a) were able to transfer their STEM knowledge to the geosciences; b) gained scientific communication and research skills, and c) were more interested, prepared, and confident to join the geoscience workforce. In fact, since the program's inception, many of its participants are now gainfully employed in the geosciences. Support for this program was provided by the NSF IUSE GEOPATH grants 1540721 and 1801563.

3:00 PM – 3:55 PM Concurrent Sessions

Hunter College

3:30–3:55pm • A 106

The Hunter College Early Alert Interface (PD)

Angela Haddad, Brian Maasjo & Michael Steiper

Many campuses use “Early Alert” systems to improve student success. These systems help faculty identify and communicate with students who are at risk for unsuccessfully completing their courses. Optimally, faculty use these systems to alert students early during a course and provide them with help or guidance for successfully completing their courses (e.g. attending learning center hours or office hours). Hunter College recently purpose-built an “early alert” interface that allows faculty to “alert” students by sending them emails, and generating referrals to learning centers and other offices. In Fall 2018, the new system was piloted to faculty in a limited set of high-DFW rate courses. When compared to the same courses in prior semesters, student grades improved in many, but not all, of the participating courses. In Spring 2019, Hunter is emphasizing usage of the system in high-enrollment gateway courses across campus. We have also added a mechanism to more easily send alerts in larger courses. The Early Alert system offers faculty a relatively straightforward interface to contact, help our students, and refer them to support services. Early Alert has enhanced collaboration between faculty, advising, and other student support offices.

John Jay College of Criminal Justice

3:30–3:55pm • A 106

The Comprehensive Syllabus: Making the Past Alive by Technological Innovation (IW)

Itai Sneh

Teaching undergraduate and graduate students aiming to enter professional service is a challenge. Liberal arts, in which these courses are usually taught, demand developing clear speaking and communication skills through critical thinking and original contribution beyond data knowledge and coding.

Practical path advances scholarship and meaningful research through faculty guidance. Students are actually creative by following parameters worthwhile for college and post-graduate level instruction of classic liberal arts goals of encouraging clear speaking and coherent communication.

Presenting standards combining a literature list, then a full paper, finally an oral examination (designated as an interview to diffuse potential student anxiety) to follow up on the comprehension of the contents analyzed, will be a useful exercise for students and faculty alike.

Challenge of conventional understanding of what constitutes ‘knowledge’, and of students as commodity/consumers, through more personalized tutoring and syllabus-crafting thanks to:

1. To combat plagiarism, a combination of paper-writing and oral interviews is warranted;
2. Annotated bibliography is a meritorious tool to secure legal and ethical compliance with academic standards; and
3. To enhance appreciation of intellectual property and access to the internet, syllabi should encourage regular reading of worthy on-line sources around the world.

I use the interview system to facilitate these two goals in teaching multiple courses. I use my regular class sessions to promote the last objective.

Stella and Charles Guttman Community College

3:30–3:55pm • A 209

Research in the Classroom (IW)

Ji Kim

Teaching non-science majors is a challenging task in a chemistry course. Our main goals are to 1) using experiential teaching to turn students into life-long active learners; 2) teaching responsible environmental stewardship so they will take this experience back to their community. In our introductory chemistry course for non-science majors, a research-based learning module is introduced to convert waste cooking oil to Biodiesel. The students research the benefits, collect waste cooking oil, develop methods to produce Biodiesel. Students become active learners. A deep approach to learning helps students appreciate sciences in a positive way, increase conceptual learning, and become responsible citizens.

3:00 PM – 3:55 PM Concurrent Sessions

New York City College of Technology

3:30–3:55pm • A 406

Learning Intersectional Inclusive Diversity and Intellectual Intersubjectivity: The Role of Autoethnographic Writing, Classroom Discourse, and Critical Listening (OP)

Dionne Bennett

This presentation addresses how conference concepts of 'learning as reflective practice, to achieve, and in the open' through writing, communication, and diversity can be merged and engaged by the autoethnographic writing and presentations of students. The presentation argues that Intersectional Inclusive Diversity and Intellectual Intersubjectivity enhance each other, are valuable to students in classrooms and workplaces, and are skills that can be taught and learned. Intersectional Inclusive Diversity reflects discourses about diversity, inclusion, and equity – which increasingly present inclusion and diversity as interdependent values –and links them to intersectionality. Intersectionality, a term coined by black feminist legal scholar Kimberlé Crenshaw, refers to the interrelationship of social categories such as race and gender. The concept of intellectual intersubjectivity engages the term intersubjectivity, a concept primarily used in German philosophy and European and American psychoanalysis, which describes a subject-with-subject dynamic in which participants interdependently construct each other's experiences. Intellectual Intersubjectivity centralizes understanding, critical reasoning, and knowledge-building in intersubjective experience. As an anthropologist in an African American Studies Department, I assign autoethnographic writing assignments to help students learn course concepts and how social categories are constructed and deployed. Autoethnography is a form of cultural autobiography used to develop sociological and anthropological knowledge. When students write autoethnographic essays, present their work and listen thoughtfully to each other, they learn about course concepts and each other in ways that enhance their intellectual skills, knowledge acquisition, and appreciation of diverse experiences and perspectives, which will help them succeed in the classroom and in complex professional environments.

3:00 PM – 3:55 PM Concurrent Sessions

New York City College of Technology

3:30–3:55pm • A 506

Students' Perspective on General Education Learning Goals in Computer Engineering Courses (OP)

Jose Reyes Alamo

City Tech (New York City College of Technology) has been working diligently through the past few years in creating a framework to better support general education. One of the main tasks of this effort has been to identify a set of general education learning goals and provide the tools for students to achieve them. Students take courses in their respective disciplines to attain certain skills. In the process they also achieve certain general education learning goals. The efforts to improve the general education at New York City College of Technology has focused on faculty, especially course coordinators who oversee the courses. In this work we are interested in knowing the opinion of the students and their perception on these learning goals. Towards the end of the Fall 2018 semester, several courses at the Department of Computer Engineering Technology provided a survey to their students and asked them what general education learning goals they believe were achieved in the course. The students surveyed included freshmen, sophomore, and junior levels. The preliminary results show that the intended general education learning goals were mostly achieved. The students' responses also show that other goals were attained as well, even if not intended by the faculty teaching the course or by the coordinators. This work's intention is to give faculty a better picture of the students' awareness about general education and the learning goals they believe they are attaining.

New York City College of Technology & CUNY Graduate Center

3:30–3:55pm • A 517

Preparing Students for the Industry Through Project Based Learning (IW)

Sidi Berri, Malek Brahimi, Gaffar Gailani, Angran Xiao & Deborah Hecht (CUNY Graduate Center)

Yesterday's practices are not working in today's world and certainly will not work for tomorrow. The aim of education and research is not simply the generation of results for their own sakes but, in engineering in particular, they are supposed to fulfill some significant purpose. Given the need in the early years to master theories and principles, one of the problems has been that it's taking students too long to get to the real-world stuff, the fun stuff. The shift to experiential and student-centered learning is crucial to attracting and retaining more engineering students. This communication presents the effectiveness of Project-Based Learning (PBL) through providing students with specific multidisciplinary experience in additive manufacturing and design and fabrication of medical devices as a vehicle to grasp some key skills in engineering in different areas including engineering materials, design, computer-aided design, measurement and instrumentation, and fabrication. To address this challenge the Department of Mechanical Engineering Technology at New York City College of Technology established in 2016 the Center of Medical Devices and Additive Manufacturing through NSF/NASA funding to accomplish the following: (i) Build collaboration with industry (NASA, Hospital for Special Surgery, etc) to provide students with training opportunities; (ii) provide in campus summer training to students by faculty and industry experts from different fields; (iii) build collaboration module with other universities that include training camps and production of educational material; and (iv) provide students with real life experience by involving them in designing and fabrication of prosthetic and medical devices for people in developing countries. This approach emphasizes practice vs. theory, and active classrooms vs. traditional lectures. Students are becoming more motivated to participate in the Center's projects which reflected in their academic performance. This work helps in strengthening the skills of students in manufacturing and design to respond to the urgent needs of the manufacturing industry in general and the medical and aerospace industry in particular for high-skilled engineers. The project provides a national model for advanced technology education.

4:00 PM Wine and Cheese Reception

Thank you from the Organizing Committee

See you next year at the 16th Annual CUNY CUE Conference in 2020!

Special Thanks to City Tech Faculty, Staff and Students who produced the CUNY CUE 2019 Conference

Russell K. Hotzler, President
Bonne August, Provost and VP for Academic Affairs
Miguel Cairol, VP Finance and Administration
Michel A. Hodge, VP Enrollment and Student Affairs
Vincent Roach, Assistant VP for Enrollment Management
Rita Uddin, Assistant VP and Chief Information Officer
Lucinda R. Zoe, Senior University Dean for Academic Programs & Policy

CUNY CUE 2019 Conference Organizing Committee

Lauri Aguirre, Director of First Year Programs
Pamela Brown, Associate Provost
Alejandro Cantagallo, Hospitality Management Department
A.E. Dreyfuss, First Year Programs, Academic Liaison
Julia Jordan, Director of Faculty Commons
William Luperena*, Faculty Commons Administrative Assistant
Kevin Rajaram**, Faculty Commons Webmaster
Adam Walker, Director of Theater Operations
Philip Zeng, Faculty Commons Designer

Conference Committee Support

Yu-Wen Chen and Ashwin Satyanarayana, Computer Systems Technology
Dorie Clay, Special Projects/Planning and City Tech Ambassadors
Myrlene Dieudonne, Lubosh Stepanek and Shawn Beatty of Campus Services/Reprographics
Tiffany Eager, Manager, Follett Bookstore & Café and Follett Bookstore Associates
Chioma Okoye, Administrative Assistant for Associate Provost, Office of the Provost
Sarah Paruolo, First Year Programs Peer Mentoring
Claire Stewart, Hospitality Student Ambassadors
Chief Stephen Trowbridge and Public Safety Officers
James Vazquez, Carol Abdool, Ruth Loza and Buildings and Grounds Personnel
Chantey White, Director, MJB Food Services, Aldana Vasques Williams and MJB Food Services Personnel
Chemistry Department Diana Samaroo-Chair
Dental Hygiene Department Joycelyn Dillon-Chair, Anna Matthews
Hospitality Management Department Elizabeth Schaible-Chair, Rosa Abreu, Lynda Dias, Lillian D'Orazi, Karen Goodlad
Dining Service Students Jessica Bataclan, Meiying Chen, Diana Ferreyra, Alexis Fields, Daniel Guevara, Cintya Jimenez, Mellisa Richardson
Nursing Department Margaret Rafferty-Chair, Pearlina Okumakpeyi
Radiologic Technology Department Evans Lespinasse-Chair, Ruben Thomas and Jodi-Ann Douglas
Restorative Dentistry Department Renata Budny-Chair, Josephine Glennon
Vision Care Technology Department Kim Strickler-Chair, Natalia Jimenez

Reception Staff*

Iman Abdulfattah, Julie Bradford, R. Attakuma Drakes
Tiara Johnson, Roceli Molina, Priyanka Phagoo, Javonne Senior, Laura Yuen-Lau

Technology Assistance

Karen Lundstrom, Office of Instructional Technology (iTEC), Lissette Jolalpa
Tremelle Thomas, Office of Computing Information Services (OCIS), Sheena Barley
David Turkiew, Office of Media Services, Josh Gonzalez

Undergraduate Research Coordination Committee

Ralph Alcendor, Viviana Acquaviva, Monica Berger, Reginald Blake
Mercer Brugler, Ellen Heejun Kim, Janet Liou-Mark, Alberto Martinez, Masato Nakamura, Hamidreza Norouzi, Kate Poirier
Jonas Reitz, Jody Rosen, Diana Samaroo, Liana Tsenova, Lin Zhou

City Tech Student Volunteers Tech Support and Room Managers

Ramon Acevedo, Najma Adam, Ali Alghazali, Colin Alli, Cerena Brown, Travis Caraballo, Stephany Chicaiza, Chester Chong
Semevo Dovonou, Douglas Elder, Christine Gibson, Tevin Harris, Oscar Holguin, Akeem Jarrett, Anmol Kaur
Raja Khan, Alexander Lopez, Esmelin Lopez, Alecia Massiah, Kikelomo Olanipekun, Damar Saul, Chandrica Siewsanakar, David Vidal

Student Tour Guides

Departments of Chemistry, Xiaolan Wu
Dental Hygiene, Saja Musa Erika Robles, Jasmine Tejada-Ferreira, Rosie Torres
Nursing, Elona Pocesta
Radiologic Technology Kanij Fatema, Ryan Rowe
Restorative Dentistry, Aneesa Hussain, Shane Velez
Vision Care Technology, Preston Lam

Faculty Commons Photographers**

Jeremy Renner, Hoa Vu, Lu Xue