

Touchstone

VOLUME 11.1 (FALL 2022)



Image: Justine Juliette Grindley

EUGENIO MARIA DE HOSTOS COMMUNITY COLLEGE
THE CITY UNIVERSITY OF NEW YORK

Touchstone

Volume 11.1

Cover Image: Copyright © 2022 by Justine-Juliete Grindley. All rights reserved

Touchstone 11.1

Touchstone 2022

2022 CALL FOR PAPERS

This past year *Touchstone* has continued its mission of documenting and sharing the work and the ideas of the Hostos community. *Touchstone* accepts essays from faculty and staff on any aspect of academic life. Not only does publication in *Touchstone* help faculty move a project closer to publication in peer-reviewed journals, but it also helps faculty share their work with the rest of the community at Hostos. The upcoming issue, for instance, represents a range of topics, from the use of language by native speakers to a lesson plan that uses the New York Times application. Along with the help of the entire Center for Teaching and Learning Council, *Touchstone* is grateful to its editorial board whose hard work has helped the upcoming issue come together.

This special edition will include a section that attempts to capture the impact and reinvention we have gone through during this process of transition. We would love to learn about the things that worked, and didn't work, for you inside and outside the (virtual) classroom, and how you are using this learning experience to shape your approach to teaching and learning in this new normal.

About *Touchstone*:

In linking the power of teaching to a broadening of our vision, Eugenio María de Hostos affirmed the power of education. In honor of our namesake's belief, *Touchstone*, a journal devoted to the scholarship produced by the community of Hostos, was created. The journal is published yearly by the Magda Vasillov Center for Teaching and Learning.

The goals of *Touchstone* are to increase awareness of the scholarly and creative work of the faculty at Hostos and provide an outlet for work that is on its way to external publication. In accordance to these goals, *Touchstone* publishes a diverse range of scholarship from the Hostos Community. This diversity of imaginative and creative work represents the many talents of the faculty here at Hostos.

Touchstone accepts works in English or Spanish on any of the following:

- Original scholarship on teaching and learning
- Scholarly articles from any discipline
- Best practices
- Conference Presentations or Reports
- Classroom-based research
- Teaching challenges, experiences, and lessons
- Personal Essays or Editorials
- WAC and beyond
- Book reviews
- Creative works

Send your articles using discipline citation to ([Click Here](#)) by February 1, 2023.

<https://commons.hostos.cuny.edu/ctl/initiatives/touchstone/>

For more information please contact Center for Teaching and Learning:

Room: B-418 Phone: 718.518.6804 or 2514 E-mail: (ctl@hostos.cuny.edu)

Touchstone

Volume 11.1 (Fall 2022)

Published annually by the Professor Magda Vasillov Center for Teaching and Learning, the Division of Academic Affairs, Eugenio María de Hostos Community College of The City University of New York.

Editors:

Cynthia Jones, MA Co-Director of the Center for Teaching and Learning	Elizabeth Porter, PhD English Department
Carlos Guevara, MS Co-Director of the Center for Teaching and Learning	Eunice Flemister Education Department

The Professor Magda Vasillov Center for Teaching and Learning Eugenio María de Hostos Community College
500 Grand Concourse, The Bronx, NY 10451

The Editors would like to thank:

Luz Rivera, BS Coordinator, Center for Teaching and Learning	Jason Buchanan, PhD (Former Editor-in-Chief) English Department
Juberth Tueros College Assistant, Center for Teaching and Learning	Anne Lovering Rounds, PhD English Department
Itzel Ortega Mendez, College Assistant, Center for Teaching and Learning	Andrew Connolly, PhD English Department
Sean Geritty, PhD English Department	Jacqueline M. DiSanto, EdD Education Department
Alexandra Milsom PhD English Department	Sandy Figueroa, MS Business Department
Sherese Mitchell, EdD Education Department	Victoria M. Muñoz, PhD English Department

The views expressed in *Touchstone* are those of the authors and do not necessarily reflect the positions of Eugenio María de Hostos Community College or The City University of New York

Table of Contents

Marcella Bencivenni and Sarah Hoiland, Co-Editor	Remembering Peter Roman (1941-2020): A Hostos Tribute	8
Victor Torres-Velez	Amidst the Pandemic: On Becoming a Shaman of Zeros-and-Ones at Hostos	21
Juan Soto-Franco	Smartphones, WhatsApp, and Audacity: pronunciation Enhanced	23
Marcia Ribeiro and Michael James	Germination and development of nasturtium, mustard greens and swiss chard in different substrates – Pilot Research	29
Yoel Rodriguez and Lissette Delgado-Cruzata	An undergraduate cross-disciplinary collaborative research project between two-and-four-year colleges	32
Helen Chang, Sarah Hoiland, and Rocio Rayo	Engaging and Mobilizing an Online Community: Reflections on the Hostos Debate Watch Parties	42
William Casari, edited by Gerald Meyer	La Lucha: The Struggle to Save Hostos in the South Bronx	47
Roderick Jackman	The Gestation of an Idea	57
Mayra Butler	Online learning challenges during a pandemic	58
Michael Gosset	Caiman Pride© 2019	65
Denise Cummings-Clay, Rayola Chelladurai, Linda Miles, Ronette Shaw, Elisabeth Tappeiner, and Joseph Carvalho	Team-Based Learning: Perspectives from Multidisciplinary Faculty	66
Soheli Chowdhury, Majeedul H. Chowdhury	Endocrinopathies and Insulin Resistance Can Cause Type-2 Diabetes Mellitus	76
Asrat G. Amnie	When Everyone and Everything Moved Online: My Reflections on Transitioning to Online Learning and Teaching	83
Mayra Mojica Butler	We Learn from Reflecting on Experience	89
Juan Soto-Franco	Disfruta de un Ritmo Lento / Solid, Liquid, Gas: Flexible as Water	90

Remembering Peter Roman (1941 – 2020): A Hostos Tribute

Preface

One of the most challenging aspects of the Coronavirus pandemic was not being able to grieve the loss of loved ones in the same way as we had in the past: by coming together and providing comfort to all those who mourn with hugs, speeches, and a few laughs, sharing memories, eating and drinking. Street and subway memorials have sprung up across New York City for the tens of thousands of New Yorkers that COVID-19 has taken from us and virtual memorial services have become a new norm. Hostos Professor Emeritus Peter Roman died from complications following a heart surgery on July 20, 2020. As Interim President Daisy Cocco De Filippis noted in her public remarks announcing his passing, “Dr. Roman was a long-time professor of Political Science at Hostos and a Coordinator of the Social Sciences Unit. He was also one of the founders of the College, and ‘one of its defenders when needed.’ Peter joined the faculty in 1971 and, in 1976, was an active member of the Save Hostos Committee when New York State threatened to close the institution. He retired in 2019 to pursue a variety of editorial and political activities.”

Peter was all heart--his passion for social justice and equality, his love for his wife and children, and the commitment he brought into his classroom for over forty years are evident in the recollections from Hostos colleagues and students, included in this tribute. We are grateful to Touchstone, and we thank you, the contributors, for sharing your memories of our colleague and friend, Dr. Peter Roman. Marcella Bencivenni and Sarah Hoiland, Behavioral and Social Sciences Department.

Uncompromising, unconventional, and fiery, Peter Roman was an outstanding political scientist and educator who inspired and mentored countless numbers of students with his powerful teaching and his activism.

Peter was born on March 16, 1941 in Los Angeles, and as a boy he had a brief run in Hollywood, starring in the film *You Gotta Stay Happy* (1948), the family TV series *The Pepsi-Cola Playhouse* (1953), and *Tales of the Texas Rangers* (1955). Peter later attended the University of California at Berkeley, graduating cum laude with a Bachelor of Arts degree in 1961. He then studied at Princeton University, earning MA and Ph.D. degrees in Political Science.

Peter began his academic career at Northern Illinois University in DeKalb, where he taught from 1967 to 1969. After working briefly as a journalist for *The National Guardian* in New York he joined Hostos Community College in 1971. One of the first faculty hired in the Behavioral and Social Sciences Department, Peter quickly distinguished himself as a captivating teacher, active unionist, and crusader for

academic freedom and faculty rights. In 1976, when New York State planned to close Hostos, he was active in the Save Hostos Committee, fighting successfully along with students and other faculty to keep the college's mission alive.

During the late seventies, Peter served as chairperson of the Behavioral and Social Sciences Department and chapter chairperson of the Professional Staff Congress (PSC), the faculty union at CUNY. He then became the coordinator of the Social Sciences Unit, a position he held until 2018, a year before his retirement. Among other notable contributions to the college, he spearheaded the "Social Sciences Speakers Series," bringing to the campus eminent scholars such as Eric Foner, David Nasaw, David Rosner and Gerald Markowitz, among many others.

A recipient of numerous scholarly awards, including six PSC CUNY Research awards and four CUNY-Caribbean Exchange Program Grants, Professor Roman published *People's Power: Cuba's Experience with Representative Government* in 1999. The book made a strong impact on Cuban studies and comparative government. Offering a candid discussion of the strengths and weaknesses of Castro's socialist democracy, Peter compelled readers to look at Cuba in a different way. "This well-researched and written book," wrote *Political Affairs*, "will come as a revelation to many readers. *People's Power*, based on years of field work and first-hand experience of Cuban elections and the workings of representative bodies, demonstrates that there is a functioning popular democratic political culture as the basis of the Cuban government." A testament to its influence in the field, the book was reprinted in 2003 by Rowman & Littlefield.

Following the book's publication, Peter was promoted to Professor and in 2000 became a consortial faculty at the Graduate School of the City University of New York (CUNY Graduate Center). In addition to *People's Power*, he co-edited several special journal issues on Cuba and published numerous articles and reviews in political science periodicals, including "Electing Cuba's National Assembly Deputies," for the *European Journal of Latin American and Caribbean Studies* (2007); "The Lawmaking Process in Cuba," for *Socialism and Democracy* (2005) and "The National Assembly and Political Representation," in *Cuban Socialism in a New Century* (University Press of Florida, 2004). His latest, unpublished, research focused on Cuba's new constitutional and electoral laws.

In addition to his CUNY affiliation, Peter Roman was an associate member of the Columbia University Latin American Seminar and had served on the editorial board of the journal *Socialism and Democracy* since 1985. Between 1979 and 1988, he was an editorial associate at the Institute for Theoretical History and was also a frequent guest on the Canadian radio program "The Cuban Hour" and on public radio programs in New York City and Colorado.

A popular and well respected instructor, Professor Roman regularly taught

American government at Hostos and developed a new course on the Comparative Political Systems of Latin America, inviting diplomats and scholars of Latin America as guests to the class. Among the most impressive events he helped organize was the campus visit, on May 9, 2013, of Rodolfo Reyes Rodriguez, the Cuban Ambassador to the United Nations, who spoke to students, faculty and staff in a packed A-Atrium about Cuba's history, the U.S., and the island's future.

Peter believed it is important that students learn and understand the historical significance and relevance of world events that are often not readily available and worked relentlessly to facilitate an open dialogue and learning both inside and outside the classroom.

Peter chaired the search committee that hired me at Hostos in 2004. I remember a strange mix of emotions on the day of my interview. As a (then) young woman, born and raised in Italy--a country obsessed with "fare bella figura" (literally make a good public impression) --I had spent a lot of time not only prepping for the interview, but also shopping for the proper dress. When I arrived at Hostos, I was initially taken aback by the construction on the first-floor of the B-building, the Behavioral and Social Sciences' old and messy conference room (with lots of broken chairs!), and this man, Peter Roman, with the thickest eyebrows I had ever seen, showing not even the most remote concern for formal conventions and for keeping up appearances. After my initial shock, I felt a great relief and sense of exhilaration for the opportunity I was afforded to work in a place where I could be just me, where I would be appreciated for my professionalism and my ideas, rather than my appearances. I almost never wore a suit again at Hostos, and as I got to know Peter I came to see what some considered his shortcomings--his bluntness, his contempt for bureaucratic formalities, and his unconventional leadership style--as his true assets. Peter was a person who spoke little but was resolute in his decisions, uncompromising and relentless. When I became the Social Sciences Unit Coordinator, Peter did not explain what I had to do on CunyFirst, how to approve e-PARs or how to fill templates, but he made my job easy because over the years he had put together a wonderful team of full-time and part-time instructors--a small community of scholars--committed to serve Hostos students with the same passion and dedication he had shown for forty years. The remembrances that follow here are a testament to his important legacy. Thank you, Peter.

Marcella Bencivenni, Behavioral and Social Sciences Department

I owe a great deal of gratitude to Peter Roman. He saved my professional life—and more. In 1969, I stumbled upon Peter, who, with his wife Gail, had moved to Park Slope, Brooklyn (what at that time was a lower-rent district), on the same block where my wife and I were living. We quickly discovered that we were involved, up to our necks, with "the movement." In addition to the civil rights and anti-war movements, Peter and I shared, deeply, a belief in the centrality of the labor movement as the prime means of achieving social justice. At that time, I was

working at what was then called Newark College of Engineering. Peter, working as a reporter for The National Guardian (later named The Guardian), was assigned to cover the Newark Teachers Union's second, and equally militant, strike. In a supportive role, I had been involved with this complex struggle and offered to introduce Peter to the officers and the on-the-ground leaders of this prolonged strike. Ultimately, Peter wrote important articles and the teachers won the strike. The cost, however, was great. Over two-hundred teachers and one supporter were sentenced to prison for terms ranging from ten days to more than one year for defying a court writ forbidding the strike. That jail term and my "encouragement" of a month-long student strike in response to the murder of four nonviolent peace protesters in Kent State University in Ohio cost me my job.

In the summer of 1972, I was preparing to return to my previous position as a case worker in the NYC Department of Social Services in the South Bronx when I received a call from Peter informing me that a position had opened in the Social Sciences Department which he chaired at Hostos Community College.

Peter had begun teaching at Hostos in September 1971, the second year Hostos began offering classes. At Hostos, he was like a fish in water, uniquely suited for the job. He had attended Princeton, where he concentrated in Latin American Studies. During a two-year stay in Chile he learned Spanish fluently and he became a socialist. At that time, Hostos was a bilingual college, a school where students who knew little or no English could begin their studies in Spanish while learning English. Hostos was as close to being a bilingual college as any other institution of higher learning in the United States. Peter's fluency in Spanish and his knowledge of Latin American history enabled him to teach courses relevant to Hostos' students in Spanish.

Prior to becoming the Professional Staff Congress (PSC) Chapter Chair, Peter played a major role in saving the lives of Chilean refugees by working with the Hostos administration to arrange commitments of employment, which enabled them to obtain visas. Outside of Hostos, he helped obtain work permits for at least one Brazilian refugee. Peter also played the key role in obtaining an appointment at Hostos for Dr. Herbert Aptheker, the renowned African-American historian and the literary executor of his close colleague, W. E. B. Du Bois, who because of his political views and activities had been barred from academia.

Peter consistently supported the campaigns of the five-year long movement (1973 to 1978) to Save Hostos, which was threatened with closure during New York City's financial crisis. He wrote letters on behalf of this struggle to public officials and twice had letters published in The New York Times. He lobbied, and of course he could always be seen in the ranks of the luchadores (those who struggle). Peter helped to bring Hostos' cause to wider audiences necessary for the magnificent victory of saving the college. He is one of the giants responsible for what was for

that period the most successful mass movement in New York City.

From the Fall 1978 to 1984, Peter served two terms as the PSC Chair. From that position, he negotiated an agreement with then President Flora Edwards to limit enrollment to twenty students in all developmental courses, and won battles to save the jobs of individuals who had been treated unfairly by the administration.

Subsequently, Peter played a leading role on academic committees, groups advocating for our college, the union, and Leftist organizations such as the Hostos Solidarity Coalition that brought together the fight against apartheid, support for Nicaragua, and the struggle for social justice here in America.

Over time, Peter's major energies shifted to lecturing and publishing about Cuba. In so doing, he became a recognized scholar/spokesperson for Cuba's democratic features found in their workers' communal and occupational experiences that were unavailable to their counterparts in "democratic" countries. For many years, he maintained an especially close relationship, both as a contributor and a member of its board, with the journal *Socialism and Democracy*.

If Peter had written his own obituary, he would have put all that has been noted above after talking about his family--His wife Gail, his daughter Hannah and son Karl.

Peter Roman put his life to good purpose. He would have loved to have heard a song that in years gone by was sung at the wakes of people's heroes: "To you beloved comrade we give you our vow—the fight will go on." If we do not know its melody, we can hear it in our hearts.

-The late Gerald Meyer, Behavioral and Social Sciences Department (June 5 1940 - November 10, 2021) --Rest in Power, Jerry

I can well remember when I first arrived at the college how Peter made himself available and how much I loved the cross-fertilization of ideas we shared, spending countless hours discussing Cuba, Puerto Rico, Marxism, and internationalist global perspectives. I loved his blatant honesty and straight-shooter style, which he often accompanied with a funny quip. Peter practiced what he preached, championing (as a former Behavioral and Social Sciences Department Chair and Social Science Unit Coordinator) workers' rights at the college and always being quick to defend any faculty against the administration when he felt they had gotten the short end of the stick. He invited an array of influential speakers to his classes to share world experiences, even our former Hostos President now Chancellor, Felix Matos Rodriguez. I am glad I got to share how important he was to me personally before he retired. As is often the case when dear friends pass, we reflect on the love we had for them and all we never got to say. I thought in my contemplative moments

how, if I could contact him in my prayers, I would quip, “Peter I know you’re an atheist but, you see, I knew you would end up dancing with the angels in a socialist heaven. Will miss you. Rest in peace, dear friend.”

-Howard Jordan, Behavioral and Social Sciences Department

Peter was a good friend to me. He was very supportive and he valued good teaching and maintaining good relationships with the students. The students enjoyed his classes and appreciated his passion for his subject. Even though I am in a different unit, I could tell that he was a great coordinator and was fully supportive and proud of the faculty in his unit. Peter had ideals which he fought for; I remember when he advocated for Julio in the audiovisual department and helped save his position from being cut. I am deeply saddened by his loss.

-Amy Ramson, Behavioral and Social Sciences Department

I came to Hostos in 2009 as an adjunct professor of history, trying to gather my bearings as an instructor at a new institution. Besides my friends Ernest Ialongo and Marcella Bencivenni, another person who took an interest in making sure that I had a good start and experience at Hostos was Peter Roman. Peter asked me about how I was adjusting at Hostos and helped make sure I had the things I needed in order to be an effective instructor.

The longer I remained at Hostos, the more we got to know one another, and when I transitioned to being a full-time member of the faculty, Peter was as much a champion for my success as every other member of the Social Sciences Unit. Peter supported me and all of his colleagues because he believed in what we were doing inside the classroom and in our research.

I also got the pleasure of hearing how much Peter’s students respected and adored him as a member of the Honor’s Committee during Honor’s Course Presentations whenever Peter taught his famous Political Systems of Latin America course. The passion with which he and his students described what they were learning was inspiring. He used his many friendships and political connections to introduce his students to diplomats, consuls, and leading scholars of Latin America from all over the country and world. These students, and his own continuous research, kept Peter engaged in the political struggles he cared about, and with the students he cared about just as much, if not more.

Peter Roman was a formidable advocate for the people and issues he cared about. His leadership of the Social Sciences Unit was an incredible model to experience and be mentored under. I am thankful that Peter was in my life.

-Kristopher Burrell, Behavioral and Social Sciences Department

Many years ago, English wanted to pass a special topics shell—a course that could

be taught whenever and by whomever and about whatever. It would have standard assignment types and grading policies and reading requirements and so on, but the prof teaching it could basically teach their own special area of interest without the hassle and permanence of passing every new idea right on up to the Chancellor. So we spent about a year drafting the syllabus and after all the usual CWCC stuff, we presented it in Senate. And Peter Roman stood up--actually he was almost always standing up--and said: "so you could teach a course on the speeches of George Bush?" And everyone in the senate laughed. And laughed. And laughed. And instead of calling him on it, and saying, "yes, and that's not actually a bad idea, Peter, we should teach a class on political speeches" we all got discombobulated and flustered and upset and the course failed spectacularly. I probably even voted against it. Afterwards, a bunch of people were mad at Peter for about two years maybe longer. I thought it was as funny as hell though. The course eventually passed. We even prepared a special "Peter Roman Defense" just to be certain. No actual harm done. And besides, Peter was right. We could teach a course about any text worth considered analysis. Not only could but should. That's how I remember Peter. Right and funny.

-Carl James Grindley, English Department

Peter and I developed a lasting fondness for one another because when I first started at Hostos in 2012, I had to teach at 8:00 a.m. and we were usually the only two full-timers around at that time. We kidded each other and looked out for one another even after that first semester. Besides that, he was a great resource for all of us and so focused on our students. I will miss him greatly.

-Kate Wolfe, Behavioral and Social Sciences Department

Peter was such a huge figure, it doesn't really seem possible that he is gone--and perhaps he never really will be. His powerful influence lives on in the spirit of the department. I am able to say this, even though I had very few personal interactions with Peter, so I am not able to say anything more specific. Perhaps this in itself is a tribute to how huge a figure he was and how pervasive the influence of his strong personality and outstanding scholarship were. It was a privilege to have known him and to be a part of the department he left to us.

-Karen Steinmayer, Behavioral and Social Sciences Department

Peter would often try to run me over as he pushed the wheeled television and DVD player around the 3rd floor of the B-Building. A luddite in some ways, Peter did not request a smart classroom but preferred to wheel the apparatus around the building. Donning a bright yellow raincoat, he would also try to hit me with his bicycle, laughing as he headed to or from the elevator. His antics were not limited to the cart or his bicycle in the corridors; he often created a ruckus during departmental meetings as he ate his pizza, bushy eyebrows moving up and down as he quipped. On occasion, he would point at an open seat next to him when I walked in with a

mischievous smirk.

During Peter's last year teaching, my schedule shifted and I was newly able to take up on his departmental invitations to his 8:00 a.m. Latin American Politics Honors class. I was stunned by the graduate-level seminars with world renowned scholars. We shared a few students and Hostos alumna Denise Herrera said of Professor Roman, "He was a powerful and revolutionary professor! May his soul Rest in Peace." Another Hostos alumna, Isatou Batchilly, said, "He was one of the best professors at Hostos, and he inspired me a lot. May he continue to sleep in peace."

When Peter retired, I missed him but we kept in touch and got together on a few occasions. Peter and Gail invited my son and I to a vegetarian feast at their apartment early in 2019. Peter was in his element with his dog, his books, the love of his life, Gail, red wine, and friends around a dinner table. Peter and Gail regaled us with their love story, strikes, and of course, politics and Trump supporters. Retirement suited Peter and they were gearing up for a trip to Germany to visit their daughter. Plans to meet at their summer home over the summer didn't come to fruition but we met at the Auschwitz Exhibit at the Museum of Jewish Heritage in November 2019. Peter's museum style fit mine--we read every single thing and stopped to stare at every photo and exhibit while Gail was close by adding bits of Peter's family history. Their daughter Hannah was far ahead of us. We walked and talked for over four hours. He told me the story of his father's narrow escape from a concentration camp and how his mother managed to get him out, saving his life. Plans for our next museum excursion in March were halted because of COVID-19, but we continued to exchange emails (of course Peter wanted to know the outcome of the BSS election) until several went unanswered. I didn't call the landline when he didn't respond to my emails because I thought his non-response was an indication that he did not want to be a guest speaker in my Zoom class to describe his activism at Hostos or attend a Zoom event I was organizing and I respected Peter's tacit understanding of the power of people in a room.

Peter's legacy and imprint at Hostos is huge and I cannot begin to pay tribute to his role as a founding faculty member, activist, scholar, professor, colleague, and friend. I will miss Peter dearly and treasure the time we had together and continue to assign Peter's 1976 letter to then-New York Governor Carey. His message then is more relevant than ever today. Rest in Power, Professor Emeritus, Dr. Peter Roman.
-Sarah L. Hoiland, Behavioral and Social Sciences Department

I would see Peter in the hallway always with his bicycle wearing a T-shirt. He told me once about writing a letter that was published in the New York Times during the first critical days of the college's life. He was not a man who spoke much of himself. He was humble and courageous. Later I found out from other people how illustrious his career was, how many great and smart people he knew, and I was

amazed. This humble man in a T-shirt with a bicycle knew the whole world and was a big part of it. God bless Peter Roman. He told me a story once. At Hostos we value our elders and I was honored to be his witness. From when he was young. He was a witness. 1968. The peace brother. Did Bobby have dreams? Did he hear voices? Did they say something like: You saw what we did to your brother? You want the same thing? Then go for it, kid. We got a bullet with your name on it”?

It was the ex footballer Giant Rosey Grier who took him aside at a football stadium in Michigan, who said, “Bobby, quit playing, man. You see all those people out there.” They were standing on the wings of a stage that looked out on the football field and it was windy and the wind was blowing in the faces of everyone waiting to see the dead president’s brother and what was going to happen and what he was going to say, like the wind was blowing in the face of the whole damn country, these people want a Kennedy, football Giant Roosevelt Grier said.

“You mean they want a martyr?” Bobby laughed nervously.

Later, RFK waded into the crowd like the people were a great ocean. He walked in like that movie where at the end Montgomery Clift walks into the ocean. He got wet, with their sweat and his own, mingled together in something like an act of love. He disappeared into the crowd, so that he was no longer one man, so that I am you, and you are me.

That first speech, levitated the high school stadium, showed the way. From then on Kennedy campaigned as if he were a pop star, as if he were the fifth Beatle. A couple times playfully he pushed his wave of hair down over his eyes that way so he looked like John Lennon. He played the Hollywood Bowl. RFK’s dangerous game inspired adoring crowds that tore off pieces of his clothing and inspired death threats. The motorcade sped through downtown Los Angeles amidst the washed-up detritus of an entire civilization, he ducked a rock that cracked the windshield of the car. He collapsed from exhaustion in San Diego and was carried off like a child in the arms of Rosey Grier. He won in California because of a high turnout in the black and Latino neighborhoods and because he got the vote of the kids, the disillusioned, and the unwashed, who said they would never vote in an election that included Nixon or George Wallace, but came out for a Kennedy. He went even beyond his brother and became the first rock n roll candidate. He came out strong against the war. He was the peace brother.

Sometime past midnight, he went to the stage of the Ambassador Hotel in Los Angeles and waved to an adoring throng of Americans. They waved posters with his face. They passed out postcards. He waved and went to meet with reporters. He was led through the kitchen where a man with two names that were the same shot him in the brain. After all that Peter Roman said, “God Bless America.” I say God

Bless Peter Roman.

-The late Andrew Hubner, English Department (16 October 1962 – August 10, 2022).

Sometimes it takes many years to learn about our colleagues outside of the College. I learned that Peter was a lover of nature as well as a home builder. When I was a Visiting Professor at Bard College at Simons Rock in Great Barrington, he and his wife invited my family and I to their country house deep in the Berkshire summer woods. We swapped stories and Peter shared details about how he had built his house over the years from the ground up. Their rural retreat was cozy, warm, and full of books far removed from any evidence of technology or vestiges of city life. On that perfect day we all enjoyed a vegetarian feast (mostly picked from their garden), went swimming in the adjacent pond along with his dog (a special member of the family), and hiked along the dirt road that was very much off the radar. I know we learned a lot about each other that day.

-Linda Anderson, Behavioral and Social Sciences Department

What do you say about a professor and a man who embodied much of the good of this world?

Professor Roman took pride in his political convictions while encouraging healthy discourse on topics among his students. He encouraged growth through the introduction of sometimes controversial political theories such as communism, socialism and other ideologies.

Before his class my knowledge of politics was limited, to say the least. Even so, I felt I knew where I stood in my convictions for representation in a democratic government. This is not to say that his beliefs changed where I stood/stand, but it enlightened and broadened my understanding of politics and government and allowed me to grow. I was able to appreciate and somewhat relate to unpopular ideologies largely rejected by much of the elitist society, which continues to shape us through media and culture. His wealth of knowledge and experience made his class engaging, alluring, and simply put, a joy.

It may sound cliché, but Professor Roman believed in me when I didn't believe in myself--so much so, that he honored me with a request to tutor his students after I had moved on from his classes.

It is truly with a heavy heart that I write this, as I credit him with making me love the study of political institutions and the laws that govern us. Many of my perspectives on politics were shaped all those years ago in the classroom of Professor Roman from the convictions I carried in and built upon to the plethora of knowledge he added. Although I know his faith lied in a more just and inclusive

form of government, I know he is at least content with the democratic removal of the previous administration for one that is a little more fair and balanced.

Rest In Peace dear Professor
-Angie Cadle Sinatra, Hostos Alumna

Many years ago, I was at my first senate meeting and getting a cup of coffee when I heard, “Hi, what is your name?” This man welcomed me and we sat down and started to chat. He told me he taught political science. That was the beginning of a wonderful friendship. I came to find out his name was Peter Roman. I found him to be warm, kind, and someone who cared about his students and stood by his word. Over the years, students would come to me to enter the radiology program and I was told that their Writing Intensive class in political science was the best class they ever took. They said Professor Roman was engaging, fun, and hard work--they learned a lot.

Occasionally, Peter would call me and follow up on one of the students who took his class and got into the radiology program. I remember one time I informed him one of “our” students was not doing well. He tracked down the student and spoke to him and followed up. The story does not end there. At graduation, out of the corner of my eye, I saw Peter shaking the young man’s hand and overheard him tell the student how proud he was of him.

Peter Roman will be missed by many. Rest in peace, my friend.
-Charles Drago, Office of Academic Affairs

When I think of Peter, I think of his strong commitment to justice and fairness for the faculty. When I think of Peter, I think also of Jerry Meyer. Together with Jerry, Peter was a strong force in the early days of the college. He continued his passion and questioning and provoking all during his years at Hostos. His commitment extended beyond Hostos walls. Again, he and Jerry Meyer, co-founders of the Hostos Solidarity Coalition, raised our consciousness to Nicaragua, racism and imperialism while keeping the mission of Hostos alive and strong. They marched, spoke, and demanded that Hostos remain open and receive the resources necessary to empower our students.

Peter also had a wonderful sense of humor. How many times, I sat next to him at meetings and laughed at his comments. He was also very caring.

Thank you, Peter, for your commitment to Hostos. May you rest in peace knowing that you gave so much to make Hostos a strong presence in the South Bronx community.
-Sandy Figueroa, Business Department

Peter was my initial official contact at the college, and was instrumental for

everything that I experienced at Hostos since that first moment in the fall of 2008. He reached out to me just before the beginning of the school year to inform me that a position was available as an instructor. I took the position and worked on my dissertation that year. At the time, Peter noted that if I defended by the end of the spring, I would be eligible for an open tenure-track line. I finished, and true to his word I was hired as an assistant professor beginning in fall 2009. Thereafter, I took over for Peter as representative of the Social Sciences Unit in the Senate, and that got me started on college governance, leading to my chairing the Senate today. Finally, as a Unit Coordinator, and defender of his faculty, faculty prerogatives, and academic freedom, Peter set an example of what I wanted in a college leader, and set me on the path to now chairing the Behavioral & Social Sciences Department. It is simply inconceivable to imagine Hostos Community College as the place it is today without the efforts Peter Roman put into his students, his unit, the Hostos Senate, the College, and the PSC. He set an example for all of us.

-Ernest Ialongo, Behavioral and Social Sciences Department

I met Peter in 2009 when he interviewed me for an adjunct position in Economics at Hostos. I still remember him entering room B-319, walking quickly and pushing a television cart. Little did I know that over the next ten years this image would become a familiar scene in our college. You could see him everywhere after his early morning classes pushing that cart! I still remember that what surprised me in our initial conversations was his bluntness and his passion when expressing his ideas to others regardless of their position at the college. I would learn over the years that beneath his gruff exterior was a supportive, loyal colleague who was loyal to those he cared about.

Peter was an outspoken advocate of Hostos and was passionate about Cuba and Latin American politics, all topics we had in common. Ten years have passed since we met, and I will always be grateful to Peter for giving me my start at Hostos and providing me with unwavering support over the years we have worked together. Peter fervently believed in Hostos' positive contribution to its students and the community at large and I am thankful that he imparted that passion to me. I remember the last time I saw him and his wife Gail at the Latin American seminar at Columbia University last year. We sat next to each other; we shared a subway; we debated. He was a little slower with his movements, but he was the same strong and good-naturedly stubborn person with whom you would rarely win an argument!

-N. Michel Hernández Valdés-Portela, Behavioral and Social Sciences Department



Gerald Meyer Collection. Hostos Archives and Special Collections/ The City University of New York. With special thanks to William Casari, Library Department, for submitting the photograph for this tribute.

“Hostos United for 500. “CUNY Digital History Archive, accessed February 13, 2021, <https://cdha.cuny.edu/items/show/6282>.

“I like teaching here. I like living in New York. I am from California. Students ask me why I am here. I have a job and I really love the job. It gives me an opportunity to do what I like to do--and they pay me for it!”

Hostos50 Oral History Collective, Peter Roman’s Interview with Soldanela Rivera, accessed February 11, 2021, <https://www.hostos.cuny.edu/hostos50>.



Photograph submitted by Marcella Bencivenni.

Amidst the Pandemic: On Becoming a Shaman of Zeros-and-Ones at Hostos

Victor M. Torres-Vélez, PhD
Latin American & Caribbean Studies Unit Humanities Department
May 19, 2022

Undeniably, much has changed since last year. We are still in the midst of a pandemic of proportions only close to those of the so-called Spanish Influenza a century ago. With no cure in sight, there is virtually nothing that has not been affected by this global health crisis. Education is, of course, no exception, and here we find ourselves unexpectedly thrown into a ruthless vortex of pedagogical angst.

This angst is all the more profound if we acknowledge that the fundamental medium of teaching since the 12th century, a classroom full of students, is no longer viable, at least until the foreseeable future. Forced to evolve, our students and ourselves have morphed into a flow of the zeros and ones beaming into electronic screens in an imperfect attempt at recreating our classrooms. Oh, dear Kafka, if I could only tell you how relevant your work is these days! Here is to hoping for butterflies!

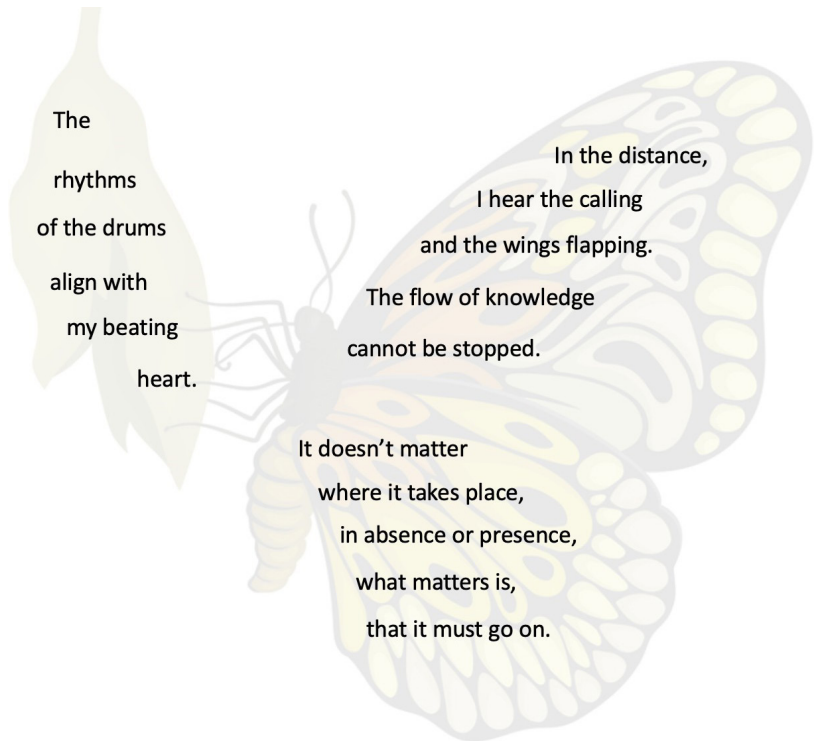
Transformations are rarely easy. This one is no different.

During the pandemic I had to deliver three courses, with two preps. One of these was writing intensive. To say the shift to online teaching was overwhelmingly dramatic is, of course, an understatement. I approached the challenge by providing my students (and myself) with as much a sense of continuity and normalcy as I could. For me, that meant running my three courses synchronously using Zoom. I did so immediately. Once face-to-face classes were cancelled across all CUNY campuses, I got my courses distance-learning ready for the following week. It was back-breaking. The nature of online courses requires a clarity and transparency which only comes easily in face-to-face classroom interactions. The extremely time consuming everyday creation of new digital friendly and clear content became the norm. From new PowerPoints, to interactive whiteboard apps using the iPad, to lecture-video recordings, to the testing of new platforms, such as Peergrade, that mimic classroom student feedback interactions, I put everything I had into these classes.

But perhaps, intellectual continuity was the least important thing I could offer my students. In the thick of it all, losing family members to COVID-19, mourning, facing isolation, unemployment and a great deal of anxiety, knowing we somehow had each other's back, having something to look forward to, a space of sharing, made all the difference.

Faculty was not alone in this transformation. Hostos EdTech had in place a series of online trainings that were modified to provide support to faculty. While I did not agree with some key aspects of the distance learning certification process, it is undeniable that the two courses, Road Map to Teaching Innovation and the Online Initiative, were useful. I took this training twice since I needed to be able to teach my summer course and also to get the fall 2020 courses ready. Thanks to this training I was able to convert three courses to asynchronous distance learning: LAC 118, LAC 118 (WI), and LAC 132.

Teaching during the times of the pandemic was hard beyond anything I could have imagined. At times, I deeply resented the Online Teaching Initiative for all the energy it required at a moment I had little left. I nonetheless went through with it. The rite of passage was grueling. But I too became a shaman of zeros-and-ones. And thanks to this, I can better serve my tribe. Dear Kafka, I am not quite a butterfly yet. There is still much more to learn, but I fully embrace my metamorphosis, if that means to honor my students.



The
rhythms
of the drums
align with
my beating
heart.

In the distance,
I hear the calling
and the wings flapping.
The flow of knowledge
cannot be stopped.

It doesn't matter
where it takes place,
in absence or presence,
what matters is,
that it must go on.

Smartphones, WhatsApp, and Audacity: Pronunciation Enhanced

By Juan Soto-Franco, English Department Adjunct Lecturer
Hostos Community College, Fall 2020

Intro

After teaching EFL (English as a Foreign Language) in the Dominican Republic for more than a dozen years and ESL (English as Second Language) in the United States for more than five years, the researcher realized that most beginner and intermediate Dominican students tend to make the same pronunciation mistakes here and there. Part of the mispronounced phonemes include /d3/ vs. /j/ as in Jong vs. young; /b/ vs. /v/ as in best vs. vest; /m/ vs. /n/ as in same vs. sane; /θ/ vs. /t/ as in three vs. tree; epenthetic /ε/ as in Spanish, speak; and /ɔ/ as in autograph. His experience, observation of mobile devices' proliferation, and the use of mobile applications motivated him to carry out this classroom research. This research included Dominican participants who used their smartphone to record six statements and WhatsApp to share their audio files. The researcher utilized Audacity (an audio recording and editing software) to edit the audio files. The goal was to help participants enhance their pronunciation in English.

Brief Literature Review

Using smartphone features regularly is so ubiquitous that it has become second nature. Consequently, incorporating them into our language learning process along with the right coaching/advise should result in a familiar activity that benefits learners. According to dos Pereira (2018), “utilizando as ferramentas à que estão expostos diariamente, poderiam adquirir o conhecimento de forma a aprimorar sua produção escrita e oral em Língua Inglesa...” (p. 505). [utilizing the tools that they [students] are exposed to daily, they can acquire knowledge and refine their written and oral production in the English language... (my translation)]. Furthermore, Andújar-Vaca & Cruz-Martínez (2017) added that “...through authentic interaction and feedback, Voice-based MMC [Mobile-mediated Communication] constitutes a powerful tool for developing second language speaking proficiency” (p. 50). These authors support the idea that the use of MMC along with feedback certainly helps in the development of second language speaking skills.

Hypotheses

- Participants will improve their pronunciation after recording the statements, listening to the feedback, and practicing their mispronounced phonemes
- Participants would be willing to adapt the practice model utilized in this project

Methodology

- Participants

Six Dominican Republic (DR) natives living in Santo Domingo (2) and La Vega (2), and in the Bronx, New York (2) participated in this mini-pronunciation project. They were young learners in intermediate level of English. They freely agreed to participate after their respective instructors spoke and explained to them the purpose of this project.

- Instruments

To conduct this study, the researcher utilized two specific instruments to collect data. One the was participant's smartphone, and the other instrument was a Google Forms survey with six questions (five Likert scale style and one open-ended). The former questions collected participants' level of difficulty in reading the statements and understanding the researcher's feedback. The latter questions aimed to determine students opinion about the technique the researcher utilized to give them feedback. The last two questions inquired about their willingness to participate or recommend other students to participate in similar projects. As secondary instruments, students used the mobile application called WhatsApp and the researcher utilized Audacity (an audio recorder and editor).

Procedure

Based on the observation that most Dominican English language learners tend to fail to pronounce certain phonemes (read introduction above), the researcher purposefully made up six statements that recreated such linguistic environment. They are as follows: 1. My friend Jong is very young. 2. Vanessa has a beautiful TV. 3. After the accident, she is not the same sane person. 4. Hey, they're thinking we're sinking. 5. I see Steven can speak Spanish. 6. The author is signing autographs in the restaurant. With these statements ready, the researcher contacted three colleagues (two in the DR and one in the Bronx) and explained to them the idea behind the project via email. They agreed and spoke with their students, who freely agreed to participate. Participants received the statements above via email. Next, they used their smartphone to record them; after that, they shared the audio files with the researcher via WhatsApp. Once the audio files were received, the researcher uploaded them to Audacity and listened to them to determine where pronunciation improvement was needed. Wherever there was a mispronunciation, the researcher inserted his intervention, which consisted of recording this command, "Please repeat!" The command was followed by the word with the correct pronunciation and a blank space or pause for participants to repeat the recorded word. The word was inserted again with its respective blank space or pause for practice. Once the new recording was finished, the researcher sent it back to the students for practice via WhatsApp. After they practiced the words, they re-recorded the same sentences and sent them back to the researcher for verification. Finally, a Google Forms survey with six questions was sent to the participants via email to collect their feedback about the pronunciation project.

Results, Analysis and Conclusion

Table 1 below (columns left to right) illustrates the participant's name, original audio file, the edited audio file, and the number of mispronounced words. While it is true that in most of the cases there were three mispronounced words or less, it is also worth noting that in the other two cases there was a total of six and 14 mispronounced words, respectively.













Participant's Name	Original Audio	Audio with Corrections	Number of Corrections
[Redacted]			1
I [Redacted]			3
F [Redacted]			1
[Redacted] A			6
J [Redacted]			0
O [Redacted]			14

Table 1: Participants original and edited audio files with the number of corrections

The first five questions on the questionnaire were Likert scale style and the sixth one was open-ended. The charts below illustrate the different responses given by the participants. The last question includes a summary of their opinions.

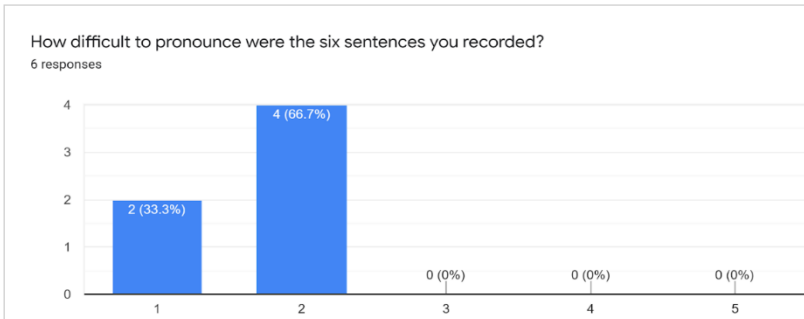


Fig. 1: Difficulty level to pronounce the sentences

Figure 1 above illustrates participants' responses regarding their difficulty in pronouncing the sentences they recorded. Most of them responded that they found it "Very easy" and "Easy." Their combined total was 100%.

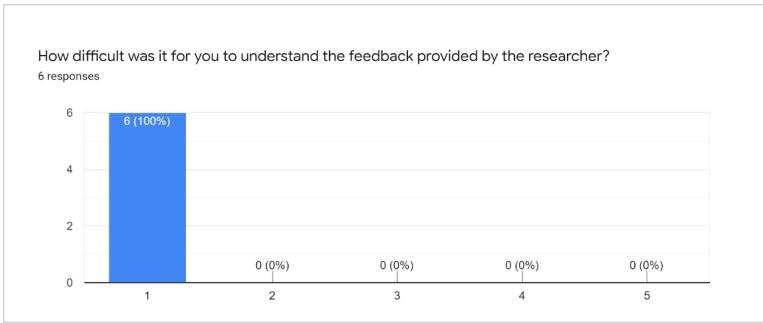


Fig. 2: Difficulty level to understand the researcher's feedback

When asked about the difficulty of understanding the researcher's feedback, all participants (100%) stated that it was "Very easy" (Figure 2).

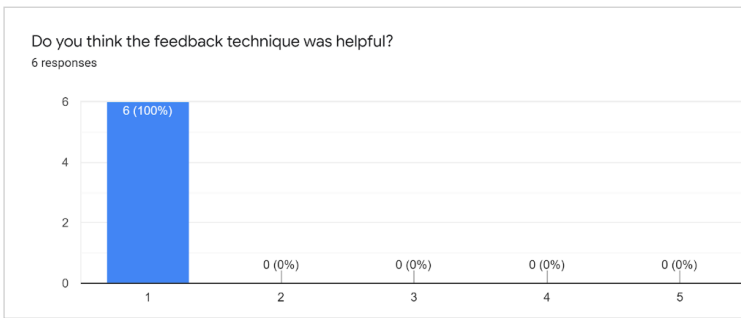


Fig. 3: Helpfulness of researcher's feedback

The third question asked participants if the feedback technique utilized by the researcher to help them enhance their pronunciation was helpful. They all (100%) responded "Very helpful" (Figure 3).

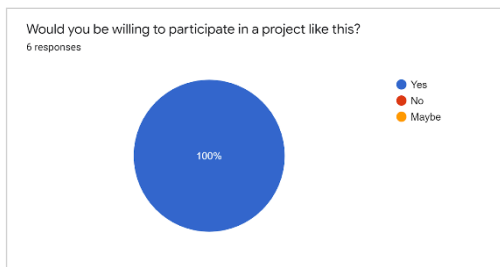


Fig. 4: Willingness to participate in future project

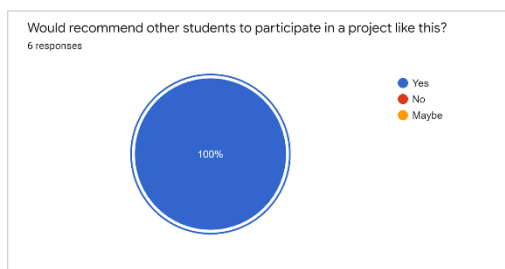


Fig. 5: Recommending others to participate

Figures 4 and 5 above show that participants are not only willing to participate in future projects like this, but also, they are willing to recommend other students to do it. Participants unanimously agreed 100% on their responses to both questions.

The last question on the survey asked participants to say what they thought about the project. Overall, their responses show that they enthusiastically found it helpful for their English pronunciation enhancement.

Moreover, participants are willing to participate again and recommend this project to other students because they noticed how beneficial this activity was. Below is a list of their direct quotes to Question 6.

- Helpful!
- From my point of view, this project was very good and helpful to improve my pronunciation.
- I think It was very helpful, I liked It and I think that It could be done more frequently mainly with those students who are starting the career to help them to improve their pronunciation.
- Helpful!
- It was really good because it helped improve my technique when I'm [I am] talking [speaking] in English.
- These projects have good benefits, since it helps to understand the complexity and at the same time how simple the understanding, pronunciation and technicalities of English can be.

The results of this classroom research show that by using current technologies such as smartphones, WhatsApp and Audacity, participants can improve their pronunciation skills when intervention and good feedback are given to them. One aspect worth mentioning is that this asynchronous modality to assist participants in their pronunciation skills lends itself to the current times in which we live. That is, they were able to record the statements, send the audio files and later practice the corrected phonemes at their own time and place. The two hypotheses above were confirmed as participants expressed that they found this project helpful and

improved their pronunciation skills. They also mentioned that they would be willing to participate and recommend other students to participate in a similar project.

Recommendations

Founded on the results expressed by the participants, this researcher makes three recommendations: One, a follow-up study with a larger sample size is recommended. Two, Dominican students from the five boroughs of New York and more provinces from the Dominican Republic should be included. And three, other phonemes that might be identified by the researcher to offer students an ampler opportunity to improve the pronunciation of the English language should be included.

Contributors

- Prof. José Luis Reyes, Adjunct Lecturer at Bronx Community College (BCC) English Department and his students
- Prof. Berlina Henríquez, Assistant Professor at Universidad Autónoma de Santo Domingo (UASD) English Department and her students
- Prof. Heidy Fernández, English Instructor at Universidad Católica del Cibao (UCATECI) Linguistics Department and her students

References

- Andújar-Vaca, A., & Cruz-Martínez, M.-S. (2017). Mobile-Instant Messaging: WhatsApp and its Potential to Develop Oral Skills. *Comunicar*, 50(15). 43-52. <https://files.eric.ed.gov/fulltext/EJ1168743.pdf>
- dos Pereira, C., Idalgo, L., & Dutra, A. (2018). O WhatsApp como ferramenta para a prática oral e escrita em língua inglesa. *Brazilian English Language Teaching Journal*, 9(2), 492-507. DOI: <https://doi.org/10.15448/2178-3640.2018.2.31140>

Germination and development of nasturtium, mustard greens and swiss chard in different substrates – Pilot Research I

Márcia Ribeiro¹ and Michael James²

Introduction

The species studied are important as food, but also can be used to treat some diseases. Nasturtium is an excellent source of minerals and antioxidants and has been used in popular medicine due its antiviral, antibacterial, antifungal, and antitumor properties. Mustard greens are a nutrient-rich leafy plant with a zesty Dijon mustard flavor. According to folk medicine, it can be used to treat arthritis, foot ache, and rheumatism. Swiss chard is a green leafy vegetable with highly nutritious leaves, making it a popular component of healthy diets and also a source of phytochemical compounds, pigments and other phenolic compounds; its extract has significant biological activities.

Rockwool is a rock-based mineral that has been melted and spun into fibrous cubes, it provides roots with a good balance of water and oxygen. It can be used with flow systems, continuous drip or ebb and is suitable for plants of all sizes. The soil (Miracle-Gro Potting Mix®) is a mix of nutrients prepared to garden plants. Expanded clay pebbles is made by baking clay in a kiln, its tiny air pockets provide good drainage. Best used for ebb and flow systems or other systems that have frequent waterings. The objective was to observe the growth cycle, such as: germination time, shoot length, number of roots and leaves, and signs of nutritional deficiency.

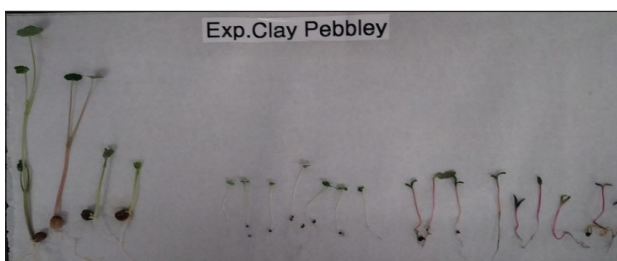
Material and Methods

The experiment was carried out in the Natural Science Department of Hostos Community College, Bronx-NY. Seeds (Johnny's Selected Seeds®) of nasturtium, mustard greens and swiss chard were established in trays with rockwool, soil (Miracle-Gro Potting Mix®), and expanded clay pebbles. After germination, the following variables were analyzed: NL – number of leaves, NR – number of roots, and SL – shoot length.

¹ Adjunct Assistant Professor, Natural Science Department, Biology Unit, Hostos Community College.

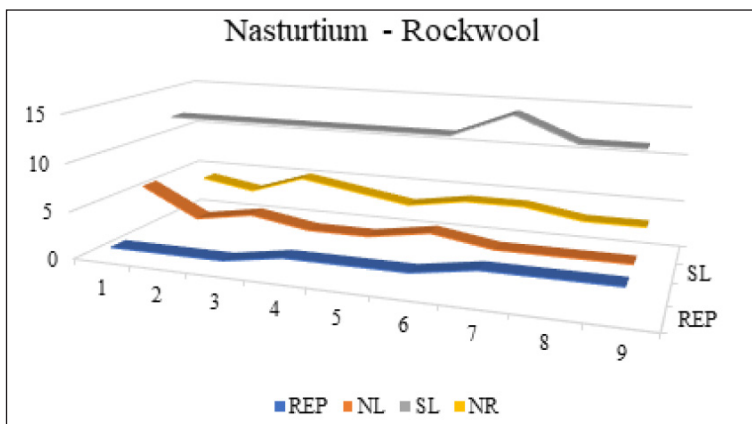
² Student, Liberal Arts and Science Major, Hostos Community College.



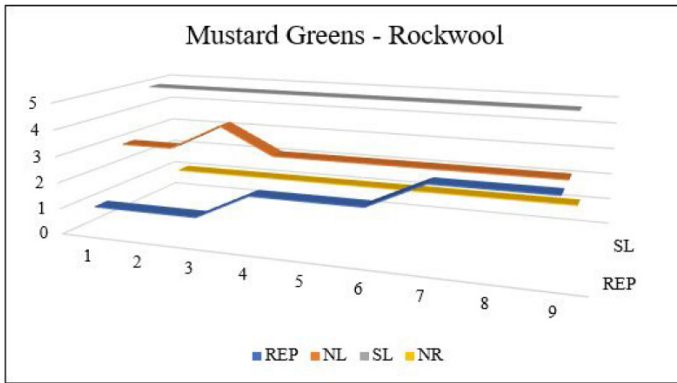


Results

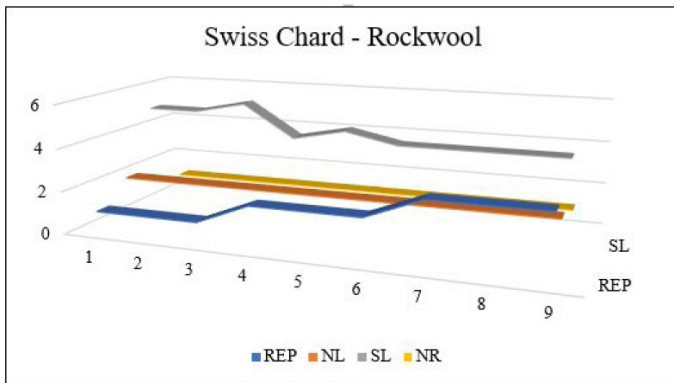
Rockwool is considered the ideal substrate to propagate and produce crops specially in hydroponic; due to its structure, rockwool can hold water and retain air space to improve roots growth. The best results can be seen in the graphics bellow.



Graphic 1: Development of nasturtium in rockwool.



Graphic 2: Development of mustard greens in rockwool.



Graphic 3: Development of swiss chard in rockwool.

Conclusion

Although the use of rockwool has already been established for a wide range of species in the hydroponic system, it was necessary to evaluate whether rockwool would also be the best substrate for non-hydroponic systems. The results showed that rockwool is the best in any system, but it is worth noting that this research is only a pilot and it would be better to repeat this experiment under an ideal environmental condition.

Acknowledgments

I would like to acknowledge the Natural Science Department, especially Prof. Francisco Fernandez, Prof. Julie Trachman, and Prof. Flor Henderson for supporting our research initiatives and for providing materials used in this pilot research.

An undergraduate cross-disciplinary collaborative research project between two- and four-year colleges

Yoel Rodríguez¹ and Lissette Delgado-Cruzata²

¹Department of Natural Sciences, Hostos Community College of CUNY, Bronx, New York

²Department of Sciences, John Jay College of CUNY, New York, New York

Abstract

The United States is facing an increasing demand for a workforce with qualifications and training in Science, Technology, Engineering and Mathematics (STEM). However, not enough students graduate from STEM majors. A large number of undergraduates start their college trajectory at community colleges and supporting their STEM experiences there, and promoting a positive transition to four-year colleges can help in increasing the number of STEM graduates. Thus, new strategies and effective pathways to encourage undergraduate students to pursue and remain in STEM careers need to be explored and/or endorsed. Here, we describe an undergraduate research experience in which two- and four-year college students engaged in a collaborative research project. We used validated surveys to evaluate gains in their individual and group collaborative skills at the end of the project. Results indicate that over 82% of the student show satisfaction with the overall outcome of the group collaborative skills gained, and 90% of the students think that the research group work is better than work carried out individually. This experience might serve as a blueprint for creating future STEM opportunities to engage community college STEM undergraduates in research and promote their transition to 4-year institutions.

Introduction

Undergraduate students in science, technology, engineering and math (STEM) fields can highly benefit from engaging in research, and this is particularly true of those of race and ethnic backgrounds underrepresented in these fields (Espinosa, 2011). Research improves undergraduate student attitudes towards science. Students report that these experiences are the main motivating force to continue their career as graduate students and researchers (Harrison et al., 2011; Willows, 2004). Studies have identified many benefits from participating in research experiences, including but not limited to increases in self-reported curiosity, science identity, and confidence (Osborn and Karukstis, 2009; Seymour et al., 2004; Russell et al., 2007). More specifically, undergraduates engaged in research develop better communication skills and creativity (Lopatto, 2009). They also show gains on their ability to analyze data and interpret findings, as well as their knowledge of scientific content (Ward et al., 2014; Makarevitch et al., 2015; 14; Brownell et al., 2015). These, in parallel, have been shown to impact academic performance and success by increasing independent learning, retention, and graduation rates (Rodenbusch et al., 2016). While the benefits are well documented, the National Survey of

Student Engagement (NSSE) reports that only 19% of students engage in research during their undergraduate education, suggesting that to increase student success and retention new strategies that have the potential to involve a larger number of undergraduates in research should be considered.

Data from 2017 indicates that community colleges enrolled over 6.8 million undergraduates that represent 41% of all U.S. undergraduate students (American Association of Community Colleges, 2018; Ginder et al., 2018). Community colleges also enrolled a large number of first-generation students and undergraduates from underrepresented racial and ethnic minorities (American Association of Community Colleges, 2018; Forrest Cataldi et al., 2018). However, research experiences at community colleges are not readily available to students (Hewlett, 2018). The Community College Undergraduate Research Initiative (CCURI) has published a report that discusses the main barriers to offering undergraduate research to community college students including limited financial resources, high faculty teaching load, need of remedial courses for entry levels undergraduates, and the isolation of faculty from the larger research community (Hewlett, 2018). The report also highlights the efforts of many institutions in involving their community college students in research, and proposes recommendations with the goal of increasing access and participation of community college students in undergraduate research.

One approach to facilitating research experiences for undergraduates is to incorporate them into collaborative research projects. Already a trend in academic research, collaborative work addresses issues such as the lack of resources and time constraints; both common problems in public institutions (Austin and Baldwin, 1992). In addition to helping faculty overcome inherent barriers to engaging undergraduates in research, collaborative experiences have been shown to help students increase their scientific research self-efficacy which in turn correlates with a commitment to science identity and staying in careers in STEM (Frantz et al., 2017). Little is known about the impact collaborative experiences might have in two-year college students engaged in research. Here we describe an undergraduate research experience in which two- and four-year college students engaged in a collaborative project. We use validated surveys to evaluate gains in their individual and group collaborative skills at the end of the project, and explore here the impact this type of intervention can have in undergraduates engaged in research experiences (Valente, 2018).

Intervention

Collaborative Research Project Plan

Students were recruited to participate in research at Hostos Community College and John Jay College of Criminal Justice both colleges of The City University of New York (CUNY). The project started in the fall of the academic year 2018-

19. One faculty member from each institution recruited the students within their college. Faculty members discussed points of collaboration in their two areas of research interest, computational biophysics and molecular biology. They also identified topics the students were not very familiar with and agreed to include presentations on these topics through the collaborative experience. A timeline was developed in which students from both colleges met regularly at one of the participating institutions to: 1) attend presentations of faculty in topics of interest; 2) share experimental approaches; 3) discuss research articles; and 4) present their preliminary findings. Faculty presentations at John Jay were mainly focused on cancer biology and experimental techniques used to conduct cancer research to introduce Hostos Community College students, all engineering majors, to this field. Likewise, meetings at Hostos Community College were focused on presenting computational biophysics theory and methods in which John Jay College students, forensics science or cell and molecular biology majors, had the opportunity to be introduced to the field of computational biophysics. Hostos Community College students taught their John Jay peers how to draw, minimize and visualize small molecules and proteins in three dimensions. Similarly, John Jay College students taught Hostos peers how to determine breast cancer cell survival after exposure to chemicals and to measure changes in microRNA levels.

Scientific research articles were provided to students by the faculty and discussed in the meetings to help students more clearly develop research questions that both groups collaboratively had to address, from the experimental and computational points of view, respectively. Student presentations increased the familiarity with the research topic and provided a platform for receiving feedback from their research peers and mentors. As a result of these presentations students explored new approaches and revised previous findings as well as improved their science communication skills.

Student Participant Demographics

Eleven students participated in this project (see Table 1). Females made up 55% of participants, and 91% were from racial and ethnic backgrounds underrepresented in STEM (54% were Black or African-American and 37% were Hispanic). The students from Hostos were pursuing A.S./B.S. in Engineering degrees within the Joint Dual Engineering Degree Program with The City College of New York's Grove School of Engineering of CUNY. The John Jay students were pursuing B.S. in Forensic Sciences or in Cell and Molecular Biology degrees (see Table 1). Students participating in this project were mostly sophomores (73%) at either college. Nine students presented their work at CUNY conferences, four at a state conference, and five at national conferences (see Appendix A).

Table 1. Collaborative Undergraduate Research Participant Characteristics

Characteristics	Number (%)
<i>Participants</i>	11(100%)
<i>Race/Ethnicity</i>	
Black or African American	6(54%)
Hispanic	3(27%)
Other	2(18%)
<i>Gender</i>	
Female	6(54%)
Male	5(46%)
<i>CUNY School</i>	
Hostos Community College	6(64%)
Jhon Jay College of Criminal Justice	5(46%)
<i>Academic Standing</i>	
Sophomore	8(73%)
Junior	2(18%)
Senior	1(9%)
<i>Expected Major</i>	
A.S. Engineering	5(46%)
B.S. Engineering	1(9%)
B.S.Forensic Sciences	4(36%)
B.S. Cell and Molecular Biology	1(9%)
<i>Presentations (Academic Years 2018-2019 and 2019 -20200)</i>	
CUNY Conferences	9(91%)
State Conferences	4(36%)
Natonal Conferences	5(45%)

Collaborative Skill Assessment

To gain an understanding of the impact the intervention had on student participants, we used qualitative research methods to investigate gains in individual and collaborative skills after the intervention using as main instruments validated surveys. The group collaborative skill assessment was divided in four main parts: 1) Support between groups; 2) Exchange between groups; 3) Exchange of ideas within research group members; and 4) Satisfaction with overall outcome. The survey totaled 10 questions that were divided in these four themes (see Table 2 and Valente, 2018). Overall students agreed on that there was support between groups, and that exchange of ideas, comments and suggestions took place between groups. Specifically, 100% of the students agreed that Support and Feedback between groups happened, that a group provided help when requested (82% agreement), that a group provided help spontaneously (91% agreement) and that each group asked for ideas from the other (100% agreement) (show in Table 2). The results show that over 91% of the student participants agree that the exchange of ideas between groups was fulfilled as well as 100% responded positively that the exchange of ideas within research group members was achieved. Students showed 82%

satisfaction with overall outcome of the group collaborative skill gained.

Table 2. Group Collaborative Skill Survey Results

Collaborative Criteria	YES (%)	NO (%)
Support between groups		
<i>Support and Feedback between groups</i>	100	0
<i>A group provided help when requested</i>	82	18
<i>A group provided help spontaneously</i>	91	9
<i>Each Group asked for ideas from the other</i>	100	0
Exchange between groups		
<i>Accepted critical comments</i>	100	0
<i>Requested comments</i>	91	9
<i>Requested comments</i>	100	0
<i>Gave advice and provided assistance</i>	91	9
Exchange of ideas within research group members	100	0
Satisfaction with overall outcome	82	18

Table 3 shows the results of the individual collaborative skill assessment in which four different categories were measured: 1) Understanding roles; 2) Supporting other group members; 3) Ownership of the research topic; 4) Assessment of peer’s contributions; and 5) Overall group work satisfaction. This survey also totaled 10 questions that were divided in these five themes (see Table 3 and Valente, 2018). 90% of the student understood their roles and knew the role of other partners, and 80% agreed they knew everyone’s role in the research group. 60% of the students helped their partner and 100% provided help when requested. Ownership of the research topic was evaluated by student’s engagement with the research topic. While 100% expressed their views/opinions to the research group, 70% of students brought new research topics to the group and 80% presented research articles. Overall, students felt they could assess their peer’s contribution (70% agreement) and 90% of them think that the research group work is better than work carried out by individuals.

Table 3. Individual Collaborative Skill Survey Results

Collaborative Criteria	YES (%)	NO (%)
Understanding Roles		
<i>I understand my role</i>	90	10
<i>I know the roles of other partners</i>	90	10
<i>I know everyone's role</i>	80	20
Supporting other group members		
<i>I help research partners</i>	60	40
<i>I provided help when requested</i>	100	0
Ownership of the research topic		
<i>I brought new research topics to the group</i>	70	30
<i>I presented research articles to the group</i>	80	20
<i>I express my views/opinion to research group</i>	100	0
I can assess my peer's contributions	70	30
Group work is better than work carried out by individuals	90	10

Conclusions

This study aimed to examine how a collaborative research intervention could help students gain collaborative and individual research skills. Two surveys were administered to the student participants to assess these skills. Over 82% of the student participants agreed that the support between groups took place and also over 82% showed satisfaction with the overall outcome regarding the group collaborative skill gained. In addition, 90% of the students agreed that research group work was better than work carried out by individuals. The collaborative research intervention also generated new knowledge in areas of common scientific interest that can only result from conducting cross-disciplinary research.

Previous work has highlighted that collaborative research can help by enriching students and faculty knowledge, enhancing faculty productivity and professional growth, expanding collaboration network, and optimizing resources from each institution or group (Cathy et al., 2010). This project directly impacted the productivity of the faculty involved that concluded with their presentation of a panel titled “Cancer Research at the Intersection of Chemistry, Physics and Biology” at the 2019 Society of Advancement of Chicanos/Hispanics & Native Americans (SACNAS) National Diversity in STEM Conference in Honolulu, Hawaii on October 31 – Nov 2, 2019. They gave presentations on “Computational Biophysics in Cancer Epigenetics” and “Chemical Compound Disruption of miRNA Biology,” respectively. Their presentations highlighted the contributions of the undergraduate student researchers and proposed collaborative research as a conduit to help bridge transitions of community college students to baccalaureate programs (see Appendix B).

It is worth mentioning that all students directly involved in this research have the intention or have continued their science and engineering majors after graduation. Hostos Community College students all completed their A.S. in Engineering and/or transferred to pursue their Bachelor in Engineering. Except one student who graduated, all John Jay College students are still enrolled. Future follow-up of students post-graduate choices would be needed to understand whether participating in this type of experiences has had an impact in their STEM trajectories. The collaborative research experience also provided an opportunity for participation in local, state and national conferences. Participating in scientific conferences can reaffirm they belong in the STEM fields and have the potential to become great scientists and engineers (Casad et al., 2016). In previous work carried out by Frantz et al., 2017 the authors observed that scientific research self-efficacy and science identity were enhanced in collaborative learning undergraduate research models when compared to traditional research apprenticeship (Frantz et al., 2017). It is possible both, self-efficacy and science identity, were impacted by our intervention. However, we did not measure these metrics here. We will consider them in our future research.

Finally, this intervention is aligned with the need of finding effective pathways to encourage undergraduate students, mainly community college students, to engage in STEM extra-curricular activities. These might help them remain in STEM careers by providing additional skills and knowledge. Community colleges house 41% of the nations' undergraduates, thus it is imperative to establish successful pipelines between two- and four-year schools in STEM education to guarantee the science and technology workforce that the United States will need in the near future.

Acknowledgments

YR and LDC would like to thank their dedicated research students and the support provided by Hostos Office of Academic Affairs, Hostos Undergraduate Research Program, CUNY Research Scholar Program (CRSP), Collegiate Science and Technology Entry Program (CSTEP), Louis Stokes Alliances for Minority Participation (LSAMP), John Jay College Program for Research Initiatives in Science and Math (PRISM), John Jay College Office of the Advancement of Research (OAR), John Jay Office of Student Research and Creativity (OSRC), NIH, NSF Hostos Engineering Academic Talent (HEAT) Scholarship Program, and Pathways to Student STEM Success (PTS3).

References

- American Association of Community Colleges (AACC). 2018. Fast Facts, www.aacc.nche.edu/research-trends/fast-facts/. Accessed 20 December 2019.
- Austin A. E., and Baldwin R. G. (1992). Faculty collaboration: Enhancing the quality of scholarship and teaching. Education Resources Information Center (ERIC) Digest. Washington DC: ERIC Clearinghouse on Higher Education.
- Brownell S. E., Hekmat-Scafe D. S., Singla V, Chandler Seawell P, Conklin Imam J. F., Eddy S. L., Stearns, T., and Cyert, M. S. A high-enrollment course-based undergraduate research experience improves student conceptions of scientific thinking and ability to interpret data. *CBE Life Sci Educ.* 2015; 14:ar21, 1–14.
- Casad, B. J., Chang, A. L., and Pribbenow, C. M. The Benefits of Attending the Annual Biomedical Research Conference for Minority Students (ABRCMS): The Role of Research Confidence. *CBE Life Sci Educ.* 2016; 15:ar46, 1–11.
- Espinosa L. L. Pipelines and pathways: women of color in undergraduate STEM majors and the college experiences that contribute to persistence. *Harvard Educ Rev.* 2011; 81:209–240.

Frantz K. J., Demetrikopoulos MK, Britner SL, Carruth LL, Williams BA, Pecore JL, DeHaan RL, and Goode CT. A Comparison of Internal Dispositions and Career Trajectories after Collaborative versus Apprenticed Research Experiences for Undergraduates. *CBE Life Sci Educ.* 2017; 16:ar1, 1–12.

Forrest Cataldi E., Bennett C. T., and Chen, X. 2018. *Statistics in Brief: First-Generation Students College Access, Persistence, and Postbachelor's Outcomes.* (NCES 2018-421). U.S. Department of Education. Washington, DC: National Center for Education Statistics, <https://nces.ed.gov/pubs2018/2018421.pdf>. Accessed 20 January 2020.

Ginder, S. A., Kelly-Reid, J. E., and Mann, F. B. 2018. Enrollment and Employees in Postsecondary Institutions, Fall 2017; and Financial Statistics and Academic Libraries, Fiscal Year 2017: First Look (Provisional Data) (NCES 2019- 021rev). U.S. Department of Education. Washington, DC: National Center for Education Statistics. <http://nces.ed.gov/pubsearch>. Accessed 20 January 2020.

Harrison M., Dunbar D., Ratmansky L., Boyd K., and Lopatto D. Classroom-based science research at the introductory level: changes in career choices and attitude. *CBE Life Sci Educ.* 2011; 10:279–286.

Hewlett J. 2009. The search for synergy: Undergraduate research at the community college. In Cejda, B. D. (Ed.), *Undergraduate research at community colleges* (pp. 9–18). Washington, DC: Council on Undergraduate Research.

James A. Hewlett. Broadening Participation in Undergraduate Research Experiences (UREs): The Expanding Role of the Community College. *CBE Life Sci Educ.* 2018; 17:es9, 1–3.

Labov J. B. Changing and evolving relationships between two-and four-year colleges and universities: They're not your parents' community colleges anymore. *CBE Life Sci Educ.* (2012). 11, 121–128.

Lopatto D. *Science in Solution: The Impact of Undergraduate Research on Student Learning.* Tucson, AZ: Research Corporation for Science Advancement; 2009.

Makarevitch I., Frechette C., and Wiatros N. Authentic Research Experience and “Big Data” Analysis in the Classroom: Maize Response to Abiotic Stress. *CBE Life Sci Educ.* 2015; 14:ar27, 1–12.

Osborn J. M., and Karukstis K. K. The benefits of undergraduate research, scholarship, and creative activity. In: Boyd M, Wesemann J, editors. *Broadening Participation in Undergraduate Research: Fostering Excellence and Enhancing the*

Impact. Washington, DC: Council on Undergraduate Research; 2009; 41–53.

Rodenbusch S. E., Hernandez P. R., Simmons S. L., and Dolan E. L. Early Engagement in Course-Based Research Increases Graduation Rates and Completion of Science, Engineering, and Mathematics Degrees. *CBE Life Sci Educ.* 2016; 15:ar20, 1–10.

Russell S. H., Hancock M. P., and McCullough J. The pipeline. Benefits of undergraduate research experiences. *Science.* 2007; 316(5824): 548–549.)

Seymour E., Hunter A. B., Laursen S. L., and Deantoni T. Establishing the benefits of research experiences for undergraduates in the sciences: first findings from a three-year study. *Sci Educ.* 2004; 88:493–534.

Thompson, C. J., Galbraith, M. E., and Pedro, L. W. Building Collaborative Scholarship in an Academic Nursing Community. *Int J Nurs Educ Scholarsh.* 2010; 7:art37, 1–20.

Valente, L. CO-LAB Guidelines for Assessing Collaborative Learning in the Classroom. 2016 (updated January 2018). European Schoolnet. <https://www.ncca.ie/>. Accessed 24 October 2019.

Ward, J.R., Clarke, H. D., and Horton, J. L. Effects of a research-infused botanical curriculum on undergraduates' content knowledge, STEM competencies, and attitudes toward plant sciences. *CBE Life Sci Educ.* 2014; 13:387–396.

Willows A. O. A model for promoting research in education. *Science.* 2004; 305:43.

APPENDIX A. Student Presentations at Local, State and National Conferences, and Research Awards

Students presentation at the State Collegiate Science and Technology Entry Program (CSTEP) at The Sagamore on Lake George, Bolton Landing, New York, on April 12 – 14, 2019, the PRISM Symposium at John Jay College on May 8, 2019, the CUNY Research Scholar Program (CRSP) at John Jay on July 24, 2019, the 2019 Society of Advancement of Chicanos/Hispanics & Native Americans (SACNAS) National Diversity in STEM Conference in Honolulu, Hawaii on October 31 – Nov 2, 2019, and the Annual Biomedical Research Conference for Minority Students (ABRCMS) at Indianapolis, 2018, Indiana on November 14 – 17, 2018 and Anaheim, California, on November 13 – 16, 2019 with the following research projects:

Hostos Community College

- Fatimata Kafando, Ndeye Bakhoum, Lissette Delgado-Cruzata, and Yoel

Rodríguez. Modulation of microRNAs by Epigallocatechin-3-Gallate in Cancer Biology: A Computational Study. (CSTEP, CRSP and presented by John François from John Jay College at SACNAS; Winner for Best Poster Presentation Biology at CSTEP and CRSP)

- Abdoul Aziz Nignan, Dariel Arrechaga and Yoel Rodríguez. Development of Small-Molecule Modulators of DREAM to Investigate Neurodegenerative Diseases.1 (CSTEP, CRSP and SACNAS) Winner for Best Poster Presentation Biochemistry at CSTEP)
- Ibrahima Doukoure and Yoel Rodríguez. Discovery of AF9 YEATS Domain Inhibitors Through Structure- and Ligand-Based Virtual Screening.2 (CRSP, SACNAS and ABRCMS)
- Escarle Beato, Emilio Peña Acevedo, Javier Corro and Yoel Rodríguez. Virtual Screening Towards the Identification of Small-Molecule Modulators of DREAM to Study Neurological Diseases. 1 (CRSP)

John Jay College

- John François, Nickolas Almodovar, Milena Rodríguez Alvarez, and Lissette Delgado-Cruzata. Bioinformatic Prediction of Neurophatic Pain Signaling Pathways in Rheumatoid Arthritis after High Throughput miRNA Analysis. (PRISM Symposium, SACNAS; Winner for Best Poster Presentation Life Sciences)
- Chante Guy, Toni-Ann Bravo, Yoel Rodríguez and Lissette Delgado-Cruzata. BRCA1 and microRNA Expression after Epigallocatechin-3-Gallate Exposure in Triple Negative Breast Cancer Cells. (PRISM Symposium, SACNAS)
- Arianna Mahadeo, Kassie Campbell, and Lissette Delgado-Cruzata. Effect of exposure to Epigallocatechin-3-gallate and Epicatechin in the proliferation of the breast cancer cell line MDA-MB-468. (ABRCMS)
- Kassie Campbell and Lissette Delgado-Cruzata. Toxicity of breast cancer cells to catechin, catechin gallate and epigallo-3-catechin gallate. (PRISM Symposium)

APPENDIX B. Faculty Presentations at 2019 Society of Advancement of Chicanos/Hispanics & Native Americans (SACNAS) National Diversity in STEM Conference in Honolulu, Hawaii on October 31 – Nov 2, 2019

Yoel Rodríguez and Lissette Delgado-Cruzata presented in a panel titled “Cancer Research at the Interception of Chemistry, Physics and Biology” and gave two presentations on:

Yoel Rodríguez. “Computational Biophysics in Cancer Epigenetics”

Lissette Delgado-Cruzata. “Chemical Compound Disruption of miRNA Biology”

[1] In collaboration with Medicinal Chemistry Institute, CSIC, Madrid, Spain

[2] In collaboration with Icahn School of Medicine at Mount Sinai, New York

Engaging and Mobilizing an Online Community: Reflections on the Hostos Debate Watch Parties

Helen Chang, Sarah Hoiland, and Rocio Rayo

Before the pandemic, our campus would have been teeming with activity and events on the Bridge and in student club offices, especially during a Census and an election year. During the remote environment that categorized most of 2020, the Service Learning and Civic Engagement Committee discussed activities and events, Library faculty developed online resources, and Hostos Student Government Association planned virtual voter registration drives. The tumult surrounding the 2020 Census, with an ever-changing stop date, added to the urgency as the Bronx was underreporting in early and mid-September. Among resources distributed by the Faculty Network for Student Voting Rights, Professor Hoiland, a sociologist and chair of the Service Learning and Civic Engagement Committee saw one idea that piqued her interest: Debate Watch Parties. The University of San Francisco was one of the only campuses that was promoting this type of event in September 2020, but their online assets provided a starting point. Professor Hoiland shared the idea with several Hostos entities including the Service Learning and Civic Engagement Committee, Office of Communications, Student Activities, and Student Development Enrollment and Management (SDEM) and the first Debate Watch Party took place on September 29th, 2020. Rocio Rayo, a panelist in the first Debate Watch Party, stepped up as a co-organizer. Professor Chang, a political scientist new to Hostos in 2020, attended and invited her class and by the second Debate Watch Party on October 7th, 2020, was a co-organizer and a panelist.

Although each of the three Watch Parties was slightly different, they all followed the same basic format. The Zoom webinars started at 8:00 p.m. Rocio Rayo curated pre-debate video slideshows that included music, census and voting information, and graphic assets for other campus events. Our start time encouraged people to arrive early and for each of the events, a few dozen people joined the webinars before the pre-debate panels began at 8:30 p.m. The panels, led by students and Hostos alumni, centered around questions co-created by organizers and panelists before the events. At 9:00 p.m., we live-streamed the 90-minute debate and utilized Zoom Chat throughout to encourage attendee participation. At 10:30 p.m., we concluded with brief post-debate panels.

A post-event survey sent to 193 attendees yielded 51 respondents (26% response rate) and revealed that 74.5% of survey respondents stayed from the pre-debate panel at 8:30 p.m. through the post-debate wrap up at 11 p.m. and 51% attended two or more Watch Parties. Of the respondents, 41.2% identified as current Hostos students, 23.5% administrators or staff, 29.4% Hostos faculty, and 5.9% indicated Other (and were likely Hostos alumni). We wanted to know why people

attended; 41% of survey respondents were looking for space to be a part of a larger community, which took on greater importance this election year with social distancing and the continuing pandemic. Support for faculty participants and student panelists was another main reason people attended (35.3%) and 17.6% said they attended for extra credit.

Zoom webinars are ideal for campus events with larger audiences but typically, a panel speaks to an audience and webinar attendees do not interact with one another. We leveraged Zoom webinar to build an online community from the bottom up with student-centered panels and an active Zoom Chat. These events proved to be very successful in ways both anticipated and unanticipated. We reflect on what we learned about our efforts to encourage civic engagement and ways to connect students with each other and the Hostos community at large in the midst of an exceptionally difficult year characterized by the global pandemic, social distancing, political tumult, and the 2020 Census and 2020 Election.

Collaborative Promotion

Virtual community building takes the best community organizing and public relations practices and puts them to the test. Our Communications Office created graphic assets and shared them on the College's Facebook, Instagram, and Twitter pages. For the second Watch Party, student panelists utilized their early college social media account to promote the events. An early college student and burgeoning influencer explained why it was important to attend and get involved in political action outside of voting. The energy from our dual enrolled students was evidenced from the bottom up and top down with the program director and academic coordinator promoting the Watch Parties to all teaching faculty and from students creating multimedia content in their classes to tell their friends and family to vote.

We also wanted to create opportunities for faculty to link the Debate Watch Parties to their course learning objectives so we collaborated with a group of Hostos Librarians who were doing amazing work on Hostos Library's online guide, VOTE!, especially Associate Professor Haruko Yamauchi who led the effort, and we created several short assignments that could be used across disciplines and were linked to liberal arts learning outcomes. Assistant Professor Linda Miles led efforts to create 1-pagers that were distributed to faculty through the Office of Academic Affairs before the second and third Watch Parties and Professor Yamauchi added them to VOTE!. Our core planning team personally reached out to colleagues, unit coordinators, and department chairs who promoted the Watch Parties within their respective areas.

Several faculty provided opportunities for students to earn points and to connect with each other outside the classroom. Nearly a quarter (23.5%) of survey

respondents said they completed an extra credit or class assignment but many came back to subsequent Debate Watch Parties without the incentive of class points.

Co-Create with Hostos Alumni and Students

Our first panel included four faculty and staff (one of whom was a Hostos alumna) and one current student, our Student Government Association (SGA) President, who Zoomed in from work. The informal feedback from the first panel was very positive and we decided to create entirely student and alumni panels for subsequent Watch Parties with the three of us actively participating as co-moderators and panelists.

We did not have to look farther than our alumni to find our cultural and social capital and a global community. The highlights of the Watch Parties were our student and alumni panelists hailing from Nigeria, Dominican Republic, Mexico, the Bronx, Puerto Rico, and The Gambia, to name a few places. Our VP Debate panelists were all-female. Some were adult learners. All panelists shared their passion for student leadership, community organizing, civic engagement, and service. Several panelists could not vote; we intentionally created diverse panels so that we could talk about the 2020 Census and other ways to be engaged in local politics and/or with community organizations.

We did not want aversion to the 2020 Election or to the candidates, two aging white men, to detract from our efforts to bring the community together, so we strove to make the 30-minute pre-debate panel the “main” event followed by the debates and Chat. To increase the comfort level of student panelists, we pre-circulated a script and asked for their feedback. What questions did they want to answer? ? What did they want attendees to takeaway? What issues were important to them? Then, we rehearsed so every panelist was comfortable with the format. We made mistakes and we laughed. The process of organizing the Watch Parties became a powerful space to create community among the organizers and with alumni and students.

Democratic Dialogue

At the start of the webinar and before the live stream of the debate, we set out the ground rules for Chat. Throughout the livestream, we asked the attendees questions to promote open dialogue, and the moderators and panelists responded continuously to attendee questions and commentary, and added commentary. There were few, if any, silences in Chat.

Zoom Chat leveled the playing field between students, faculty, and staff. Due to the nature of Zoom, only attendees’ first and last names were visible so most students did not realize they were replying to an Associate Dean’s remark or

laughing alongside a department chair. We encouraged a robust dialogue and our attendees' quips, comments, and critiques rivaled those on major networks and social media. As organizers, we had plans and backup plans in case the Chat became a space for hate speech, racism, and/or disrespect, particularly since our Zoom Webinars were open and promoted across CUNY and elsewhere; fortunately, we did not have a single incident.

Action Items and Calls for Action

We focused on the 2020 Census during the first Watch Party providing information in the pre-debate slideshow, on the panel, and in Chat. We urged attendees to fill out the Census and to ask friends and family if they completed the Census. When the Census was abruptly ended, our call to action for the second Watch Party, the Vice Presidential Debate, was early voting and getting involved in local community boards, particularly since we had a large Early College presence. When the second Presidential Debate was cancelled (what would have been our third Debate Watch Party) after then-President Donald Trump tested positive for coronavirus, we focused on the ballot itself for the third and final event and sought panelists that were very involved in New York City politics and service. Throughout all three events, we utilized national graphic assets and social media hashtags including #earlyvoting, #ballotready, #voteplans and being #pollready.

A majority of survey respondents (58.8%) indicated that they learned something new about the census, voter registration, early voting, and/or ways to get involved in their community and 66.7% stated they did something differently as a result of attending one or more Watch Parties. Given the diverse survey respondents, a mixture of students (41.2%), faculty (29.4%), and administrators and staff (23.5%), it is impressive that $\frac{2}{3}$ of respondents embraced our calls to action and created their own! Some of the unanticipated effects of the Watch Parties included multimedia content, networking between alumni and our Alumni Relations Office, a proposal for a new Political Discourse Club, and invitations to local events via one of the alumni panelists.

Three-quarters of survey respondents are interested in attending local election events, so the first follow-up email to attendees included links to information about New York City's special elections, primary, and election. We plan to utilize the Debate Watch Party format for the 2021 New York City mayoral debates.

Data Collection and Post-Event Outreach

We wanted to avoid a one and done event. The Zoom attendee lists provided us with new contact lists. Attendees who attended one Watch Party, two Watch Parties, and all three Watch Parties were emailed as cohorts with a message of thanks, next steps, and an invitation to complete our post-event survey. The survey provided valuable information regarding the utility of the Watch Parties and a snapshot of

participants. A new core that included 48 faculty, staff, and students who attended multiple Watch Parties emerged as a group that is not part of any one committee or entity but exhibited an extraordinary commitment to this digital community.

We created short post-election reflection activities and shared on the Hostos Lincoln Academy Early College's website and in Hostos' Lib Guide VOTE! We connected with our Counseling Center, anticipating increased need for services in the days following the election and the uncertainty as votes were laboriously counted. We supported Student Leadership as it hosted one of our Watch Party alumni panelists and we sought ways to continue to connect across disciplinary silos. We also sought to showcase student work; Rocio Rayo created a page on Hostos Lincoln Academy's website with two activities: The Worry Box and the Five Word Novel.

The three of us formed our own band and worked through a variety of setbacks, delays, and a debate cancellation. We located allies in various sectors of the campus, leveraged relationships with different campus entities, particularly Library faculty, and operated using the same kind of grassroots activism that is part of our institutional culture.

Conclusion

Despite the upheaval of the pandemic and an online semester, our Debate Watch Parties opened new avenues for civic engagement, community building, and action. Two-thirds of the survey respondents indicated that they had engaged with someone else after attending a Watch Party, by sharing their vote plan or speaking to friends, family or colleagues about the election; this is evidence of mobilization and the Hostos spirit moving through Zoom spaces into other spaces.

One of the unexpected products of this built community was the cross pollination of ideas that bloomed across committees and programs. There were several initiatives that were happening at the same time that dovetailed together and exemplified how cooperation can strengthen the structure of a community. Instead of several separate, tangential initiatives--the online Library resources, Professor Rafael Mejia's Get Out the Vote videos, the Debate Watch Parties, the census initiatives, and the expertise of the Behavioral and Social Sciences faculty--an organic hub grew from the Debate Watch Party team where those initiatives could intersect and grow outside of the siloed nature of higher education effectively engaging and mobilizing a civically engaged online community.

La Lucha: The Struggle to Save Hostos in the South Bronx, 1975–76

By William Casari, edited by Gerald Meyer



Save Hostos rally in front of the Chase Manhattan Bank at 149th Street near Third Avenue. The November 19, 1975 rally was the first major activity of the Community Coalition to Save Hostos (CCSH). Courtesy Wallace Edgecombe/Gerald Meyer Collection, Hostos Community College Archives and Special Collections/City University of New York. For more information on this image, see: [CUNY Digital History Archive](#)

At the beginning of a presentation titled “Rebellion in the Archives,” delivered at the Archivists Round Table of Metropolitan New York Symposium, I thanked everyone who had ever signed a petition. It was names on a petition that began the fight to keep Hostos open, and ultimately saved it from closing in 1976.

This is the story of a South Bronx community that demanded its right to higher education and fought hard to save it: the story of Hostos Community College. The founding of Hostos Community College and its continued existence represents an act of rebellion against the mainstream. Named after Eugenio María de Hostos, the 19th century Puerto Rican scholar, educator and trailblazer for the rights of women, Latinos and people of color, the Hostos campus sits less than a mile from Manhattan, but a world away. La Lucha translates from Spanish into “the struggle or the fight.”

Hostos Assistant Professor and Librarian Jorge Matos explains the possible nuances of the term:

“La Lucha symbolizes the larger struggle for social justice in education, housing, employment, health care, etc. The Hostos facilities fell into that larger context, so with conveniently had a double meaning during those years. I would also argue that a smaller subset of Puerto Rican, Dominican or other Latino activists in the Hostos campaign, linked local struggles to international struggles. Be they in Dominican Republic against the dictatorship and its legacy, independence for Puerto Rico or other Latin American struggles for social justice. Remember this was the period of gruesome dictatorships in parts of the Americas like Augusto Pinochet’s in Chile” (Matos). In the 1970s, the entire college community and neighborhood clergy mobilized to save Hostos from closure. Two principal leaders of separate groups emerged in the efforts to save the college: Ramón J. Jiménez and Gerald Meyer, both professors at Hostos in the early 1970s. Jiménez writes of the movement’s humble beginnings:

“Early in the 1975–76 school year, rumors began to circulate that Hostos Community College was on a list of institutions to be closed. A small group of professors, counselors and students began to meet to plan a response. Only five years old, Hostos had nonetheless produced success stories. Born out of community struggle, its existence had always been tenuous...The group circulated a simple petition demanding that Hostos Community College be kept open. As experienced organizers, we understood that for many staff and students this was their first act of resistance.” (Jiménez 101).

Community College Number Eight

In the mid-1960s, Puerto Rican community residents and local elected officials, among others, felt the higher education needs of the South Bronx community were not being addressed by local colleges and, in essence, the whole of the City University of New York (CUNY), the public university system of New York City. Most CUNY resources landed at its popular and selective senior colleges like Brooklyn, Hunter, City and Queens Colleges. Predominantly white, these colleges served middle-class populations and had admission exams that excluded less well-prepared students.

“Hostos’ founding, along with other units of CUNY, was a direct response to the burgeoning enrollment in the university brought about by the implementation in 1970 of Open Admissions, which permitted any city resident who had earned a high school diploma or the equivalent thereof entry to the university” (Meyer 74).



The Board of Higher Education leased Hostos Community College's first building, 475 Grand Concourse, for ten years beginning in 1970. Classes began in this renovated tire warehouse at the southwest corner of 149th Street. Courtesy Wallace Edgecombe/Gerald Meyer Collection, Hostos Community College Archives and Special Collections/City University of New York.

CUNY officials, ceding to pressure from the nearby community and the imminent beginning of Open Admissions, agreed to support a new college in the heart of the South Bronx. Founded in the tumultuous year of 1968 and temporarily named "Community College Number Eight," the school began operations at the corner of 149th Street and the Grand Concourse in the Bronx, serving a predominantly Puerto Rican and African-American student body. Classes started in Fall 1970, held in a renovated tire factory that CUNY had leased for ten years.

The 1970s proved to be a challenging time for the college and for the Bronx itself. Just as the college opened, neighborhoods around it had succumbed to waves of arson fires, white flight, and racial and ethnic tensions, accelerating shifts that began in the years following the end of World War II.

By 1960 any positive view of the Bronx had completely eroded explains the author of "The Bronx", Evelyn Gonzalez: "Population shifts, racial change, housing deterioration, and residents' search for better housing were exacerbated by housing shortages, suburbanization, erection of public housing and Mitchell-Lama co-ops, and a changing economy. In addition, federal highway construction and urban

renewal programs coincided with an outbreak of drug-related street crime, leading to abandoned and burned buildings and white flight. Most assessments of the devastation of the 1960s and 1970s emphasize race, crime, poverty, the Cross-Bronx Expressway, and Co-op City and ignore a century of urban growth in the Bronx. Yet it is this ongoing urbanization and neighborhood change that helps explain the devastation and consequent revival that occurred” (Gonzalez 5).

Redlining by financial institutions and the fact that apartment buildings were worth more to property owners if they could collect insurance money after burning down exacerbated the housing shortage. Since private insurance companies would not insure buildings in redlined areas, landlords eventually obtained insurance from the federal government and then submitted claims after their buildings mysteriously burned, many times after the owner paid neighborhood children to torch them. Author Joe Flood addresses this topic in his book “The Fires” when he writes that landlords could torch their buildings for insurance money and then hire someone to strip whatever valuables like copper pipes, plumbing or wiring could be salvaged (160). This topic is also discussed in Vivian Vasquez’s 2018 documentary “Decade of Fire”.

The story of Hostos is one of survival and resurgence, and one that must be preserved and told repeatedly for future generations. Hostos’ very existence was a counter narrative to sensational headlines about the Bronx in the years preceding the City of New York’s imminent fiscal crisis.

Save Hostos

Dr. Gerald Meyer (5 June 1940—10 November 2021), born in Hoboken, New Jersey, was a longtime resident of Park Slope, Brooklyn. Progressive politics engaged him from a young age and upon entering the history program at Rutgers University, he organized the Liberal Club, which worked to support civil rights and liberties. He earned a B.A. with a major in History from Rutgers in 1965; an M.A. from City College, CUNY with a major in Russian and Modern European History in 1968; and in 1984, a Ph.D. from CUNY.

Meyer joined the Hostos faculty in 1972 and immediately became active in the political life of the college. Recognizing the school’s significance, he began saving newsletters, articles and correspondence that documented the fledgling college’s existence. He would not have to wait long before being given the chance to put his political organizing skills and charismatic manner to work.

In the fall of 1975, New York City had run out of money and was close to defaulting on its debts. On October 30, 1975, the New York Daily News printed what is probably the most infamous headline in its history: “Ford to City: Drop Dead.” With bankruptcy looming, President Gerald Ford had delivered a speech

asserting that the federal government would not help New York City (Phillips-Fein 1).









Many measures were taken to control spending, including increasing subway fares and cutting the budget of CUNY. One proposal to reduce spending at CUNY was to merge several smaller campuses with larger ones: John Jay with Baruch, and Hostos with Bronx Community College. Hostos was the newest campus in the system, founded to meet the workforce and educational needs of the economically struggling area residents. In its first five years, Hostos had already become—and remains to this day—a symbol of the vitality and potential of the community. In response to the proposed merger, the South Bronx and campus community launched a campaign to save Hostos as an independent campus within CUNY.

By November, the Hostos Senate had moved to create a Save Hostos Committee (SHC) to “mobilize the forces of the students, faculty, staff and community” (Phillips-Fein 246). Meyer led this committee working with the college administration and others.

“The SHC was an official body of the Hostos Senate which worked closely with the Professional Staff Congress (PSC), the union representing faculty. Among other things, the SHC lobbied and raised funds. The SHC also participated in demonstrations. A major rally at City Hall was co-sponsored by the SHC and the Community Coalition to Save Hostos (CCSH).” (Meyer e-mail correspondence).

Newspaper articles, photographs and reports from the press describe the “Save Hostos” movement. They attest to the determination and dedication of various groups — from campus administration to students and community organizations — as they worked in the winter of 1975 through the spring of 1976 to keep Hostos alive.

We accuse
THE MEMBERS OF THE EMERGENCY FINANCIAL CONTROL BOARD
of CRIMES against the COMMUNITY!

 Robert Caro	 William Bradford Huie	 John J. O'Connell	 ?
 Abraham Adelman	 Felix Rabinovitch	 David L. Shapiro	 Walter Ellinger

These are the members of the Emergency Financial Control Board, the government agency responsible for all the cutbacks. The EFCB members, government representatives and members of big corporations, have decided to solve the city's budget deficit through massive layoffs of workers and cutbacks of essential services, such as health, education, day care, and many others.

We accuse the EFCB members of crimes against the community by selling us to the banks, closing down vital community services, of which the decision to close down Hostos is an example.

Committee for the Democratic Rights of Puerto Ricans

Save HOSTOS - Monday MAY 10 - 11AM
march from 116th & 1st to E.F.C.B. on 56th & 6th ave.
Emergency Financial Control Board

The Community Coalition to Save Hostos (CCSH) created this flier for its May 10, 1976 march from El Barrio (Spanish Harlem) to the headquarters of the Emergency Financial Control Board. Courtesy Ramón Jiménez/Gerald Meyer Collection, Hostos Community College Archives and Special Collections/City University of New York. For more information on this image, see: CUNY Digital History Archive.

As Chair of the Hostos Chapter of the Professional Staff Congress (PSC) from 1973 until 1978, Meyer helped lead three campaigns as part of the “Save Hostos” movement which supported the fledgling college and caused the City University of New York to rescind its resolution to close Hostos. The first campaign resulted in the Board of Higher Education (the precursor to CUNY) buying the 500 Grand Concourse building for Hostos. However, no money for renovation was allocated and it sat empty for years during a chronic space shortage. The second campaign prevented the college from closing and the third successful movement obtained funding for the renovation of the 500 building, which had been newly built circa 1965 as the headquarters for Security Mutual Insurance. For unknown reasons the company had relocated and abandoned the structure by 1970. It is now the Hostos “B” building located at the southeast corner of 149th Street and Grand Concourse.

The SHC worked primarily within the established administration of the college and had several sub-committees, including ones for letter-writing, petitioning, voter registration, and community outreach (Phillips-Fein 246). Meyer, along with Ramón J. Jiménez, a fellow professor and colleague for a short time in the 1970s, would later detail The Save Hostos movement in two articles in the *Centro Journal*.

Community Coalition to Save Hostos

By contrast, the Community Coalition to Save Hostos (CCSH), led by Ramón Jiménez, focused on direct actions, such as rallies, demonstrations at banks, and, at one point, he “convinced hundreds of Hostos students, staff and even faculty to carry chairs onto the Grand Concourse where traffic on this major thoroughfare was halted for over one hour” (Meyer 84).

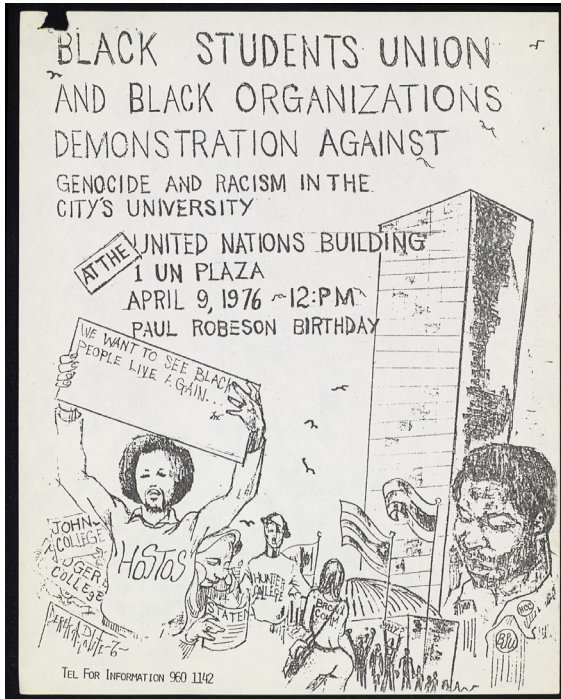
Jiménez described himself this way: “I was 25 years old — an underpaid, overworked adjunct professor teaching two courses in the CUNY system. Upon graduation from Harvard Law School, I received a John Whitney Fellowship to conduct a first amendment prison project during the day. The South Bronx was now my working base” (Jiménez 100).

Several allied groups participated in the peaceful takeover of the college, but CCSH was the most militant, as demonstrated in its flier, “Why Struggle? For Hostos and Education.”

“On March 25, 1976, after exhausting all other alternatives, Hostos Community

College was taken over by the members of the Community Coalition to Save Hostos, in order to use the resources of the college to save it, something that had been refused by the Administration. CCSH's demands included:

- Save Hostos
- Restoration of open admissions
- Assured permanence of free tuition
- No more cuts in our budget, reinstatement of funds eliminated from the college budget and, finally, no mergers of any CUNY unit ("Community Coalition")



The Black Students Union, along with other organizations, sponsored the April 9, 1976 demonstration at the United Nations protesting the closure and mergers of CUNY colleges that mainly served people of color. Courtesy Gerald Meyer Collection, Hostos Community College Archives and Special Collections/City University of New York. For more information on this image, see: CUNY Digital History Archive

Ramón Jiménez reflected on the takeover of Hostos that lasted until April 13, 1976: “The takeover became the longest in the history of the city university system,

perhaps the longest in the history of New York politics. It was one of the most incredible experiences I have had as an organizer” (Jiménez 108).

Despite all the activism, letter-writing campaigns, and the eventual college takeover, the Board of Higher Education approved the merger of Hostos with Bronx Community College, with a resolution on April 4, 1976. However, the demonstrations did not stop. The Committee for the Democratic Rights of Puerto Ricans, a coalition that included the CCSH, organized a massive march (Meyer 87). The group’s stated enemy was the Emergency Financial Control Board (EFCB), which it called a “conglomeration of bankers, industrialists and financiers who are, today, an unelected government controlling our lives.” (“Community Coalition”). On Saturday, May 10, 1976, they marched from Spanish Harlem (El Barrio) to the EFCB offices in Manhattan.

“...as many as three thousand people from all over the city of New York marched over sixty blocks chanting “Save Hostos.” No other event had ever so visibly demonstrated the breadth of concern for Hostos in Latino and other communities. The takeover, despite all of its negative consequences, had forced the story of Hostos into the press, thereby creating enough publicity to bring about this unprecedented turnout for the May 10th march” (Meyer 87).

The EFCB was created to monitor the finances of New York City during the 1975 fiscal crisis when the City was essentially bankrupt, resulting in the decision to close and merge Hostos with Bronx Community College in University Heights, the former uptown campus of New York University. With the Board of Higher Education’s resolution, it appeared the fate of Hostos was sealed, yet the activism continued.



Demonstration organized by Hostos United/Hostos Unido, which blocked traffic on the Grand Concourse for two hours, demanded that funds be made available to remodel the 500 Grand Concourse building for educational use. Courtesy Gerald Meyer Collection, Hostos Community College Archives and Special Collections/ City University of New York.

One Chapter of La Lucha Ends

In late April, members of the Hostos administration traveled to Albany to lobby on behalf of the college. Freshman Assemblyman José E. Serrano (later congressional representative) led the fight for the restoration of the Hostos budget to the state budget. Later in June, the state legislature passed an appropriation for CUNY that included the saving of Medgar Evers College in Crown Heights, Brooklyn, and Hostos Community College (Meyer 87). On June 18, 1976, the legislature passed the Landes Higher Education Act that restored \$3 million to the university budget for 1976–77. This is the exact amount that CUNY would have saved by closing Hostos. The Save Hostos movement had achieved its “impossible dream” (Meyer 87).

While Hostos remained open, the struggle continued for renovation funding for the 500 building and the eventual development of a master plan for the campus itself.

Future Directions

Hostos Community College thrives today with robust enrollment and many new faculty hires, but its future growth remains in question. One of the smallest units of CUNY in terms of enrollment (about 7,000 students pre-pandemic), it also has the smallest campus footprint. Gentrification in the surrounding neighborhoods of Mott Haven and Port Morris has caused the value of real estate to skyrocket, with many new residential towers under construction, including a 26-story residential skyscraper adjacent to the college. The lack of affordable real estate threatens to impair Hostos’ ability to expand to meet community needs. Funding has stalled for the construction of a new Allied Health and Science Building on a lot the college owns on Walton Avenue.

More pressing are the ongoing issues surrounding the Covid-19 pandemic and their disproportionate impact on marginalized communities throughout New York City, conjuring a wealth of historical parallels. While the past activism of Hostos proved successful in solidifying its presence in the South Bronx, the pandemic has revealed that the disparities that fueled that activism remain painfully present. As impending budget cuts from the City of New York loom large over CUNY, the historical roots of Hostos’ founding illustrate its enduring meaning to communities of the South Bronx in the face of uncertainty. Hopefully, that history of struggle won’t repeat itself. New austerity measures are always possible though, especially with the decline in enrollment due to the pandemic.

This paper was originally presented at the Archivists Round Table of Metropolitan New York Symposium, “Rebellion in the Archives,” on October 17, 2019 at the Center for Jewish History, and has been adapted for the Fall 2020 issue of the *Metropolitan Archivist*.

Notes:

Community Coalition to Save Hostos. “Why Struggle? For Hostos and Education.” Gerald J. Meyer Archival Collection, Hostos Community College/City University of New York (1976).

Flood, Joe. *The Fires*. New York: Riverhead Books, 2010.

Gonzalez, Evelyn. *The Bronx*. New York: Columbia UP, 2004.

Jiménez, Ramón J. “Hostos Community College; Battle of the Seventies.” *Centro Journal* 15, no. 1, 2003.

Matos, Jorge. “La Lucha meaning.” Email correspondence. October 28, 2020.

Meyer, Gerald. “Save Hostos: Politics and Community Mobilization to Save a College in the Bronx.” *Centro Journal* 15, no. 1, 2003.

Meyer, Gerald. “Save Hostos Committee.” E-mail correspondence, Nov. 10, 2020.

Phillips-Fein, Kim. *Fear City: New York’s Fiscal Crisis and the Rise of Austerity Politics*. Metropolitan Books, Henry Holt and Company, 2017.

The Gestation of an Idea

Rod Jackman

The year is 2000. Caryl Phillips digresses for a paragraph— almost a throwaway. But great writers do not throw away great ideas. Those ideas gestate.

In his non-fiction book, *The Atlantic Sound*, Phillips visits Liverpool. While there he reflects on *Wuthering Heights*, which has been haunting him since childhood. He recalls Emily Bronte’s descriptions of Heathcliff: dusky, Lascar, a regular black, dark almost as if it came from the devil. Heathcliff also wishes for “light hair and fair skin.”

What if Heathcliff is unambiguously Black? That alters our reading of *Wuthering Heights*. Liverpool was Britain’s largest flesh port, in Europe’s second largest slave trading nation. Before the Windrush migration of the 1950s, of which Phillips’ parents were a part, England was home to a significant Africoid population. Some identify themselves as LBB — Liverpool Born Blacks.

Can that slender genealogy cement the claim which Phillips doesn’t advance? Consider the locale of *Wuthering Heights*. West Yorkshire is just sixty miles from Liverpool. Mr. Earnshaw walks there and returns in three days. Port cities are cosmopolitan; they tend to harbor mixed populations. Earnshaw comes back home with a “gipsy”, who’s often called “it”. Phillips affirms there’s no textual evidence of the child’s “having any negro blood.”

But what Bronte takes for granted is not obvious 270 years later. In *A Writer’s People*, V.S. Naipaul claims that “Every kind of writing is the product of a specific historical and cultural vision.” Bronte codes Heathcliff for her contemporaries; they share a cultural shorthand. Her readers grasp the implications of Liverpool’s flesh market. They know that Catherine can’t marry Heathcliff not only because he’s a nameless man of the lower orders.

Whether one accepts or rejects this idea is immaterial. The key is its gestation. Tormented by Charlotte Bronte’s *Jane Eyre*, Jean Rhys writes a prequel decade later: *Wide Sargasso Sea*. Her novel rehabilitates Bertha, the archetypal mad woman in the attic. Something similar happens to Phillips. In 1991 he levels a critique of plantation society with Cambridge. In 1997 he enfleches Shakespeare’s Moor in *The Nature of Blood*. Finally, he circles back to Emily Bronte with *The Lost Child*, his prequel to *Wuthering Heights*.

The year is 2015. Phillips’ output is prodigious. Between 2000 and 2014 he publishes four novels plus three collections of essays. However, *The Lost Child* rescues a peripheral paragraph from 2000 to reimagine Heathcliff. Phillips’ insight generates lapidary prose which gestates for fifteen years.

Online learning challenges during a pandemic

Mayra Mojica Butler, Lecturer in the Business Department - Business & Accounting Unit

Introduction

Online learning challenges through online education in times of a pandemic is a demanding undertaking and presents immense challenges in education, particularly for students. Online teachers and students face many obstacles – and often several on the same day. It is easy to feel overwhelmed, and if you are new to teaching online or learner online, some of these obstacles can be rather difficult and often overwhelming (Gillet-Swan, 2017). The entire educational system had to make immediate changes to confront the advent of a pandemic and has changed classroom pedagogy and the process of learning in higher education (Bao, 2020). Since the beginning of March, 2020, Hostos Community College transitioned completely to online course delivery students felt lost and apprehensive. In Fall 2020 and Spring 2021 I collected survey data from my students to identify some of the challenges they faced in online classes and to document the uncertainty students experienced during the global pandemic.

Methodology

In Fall 2020 and Spring 2021, I gathered survey information from my students about how the change from face-to-face to online has impacted their learning and the challenges encountered throughout the semester. The instrument consisted of three survey questions and was completed by over 90 students in the accounting courses. The fundamental inquiry was to examine students' experiences and challenges regarding the change from face-to-face to online course due to Covid19. The survey included following three questions:

1. How has the transition from face-to-face to online classes impacted the process of learning?
2. What specific challenges were faced during the spring and fall 2020 semesters?
3. How has the transition during the pandemic impacted the learning process, i.e., course content delivery, engaging students, keeping students motivated?

I organized the responses by themes and found most of them fit into five obstacles to learning Meador identified (2019). According to Meador (2019) the obstacles are the following: 1. Disruptive Environment – Disruptions occur in many external and internal forms. Students and teachers have lives outside the walls of the school. 2. Lack of resources – A student's effectiveness cannot help but be limited when they are not having the necessary resources to do their job effectively. For example, when they don't have internet. 3. Time Is Limited – Teachers must maximize the time they have with their students. Every minute with them should matter. 4. Individual of Students – Every student is different. They have their own

unique personalities, interests, abilities, and needs. 5. Expectations in Flux – lack of stability creates nervousness, uncertainty, and an assurance that our students are being cheated in some aspect of their educations.

Results

Based on student responses many of the challenges were interrelated. In the first semester online, many students had the similar doubts, challenges, and questions. For the 80% (72 out of 90 respondents) the transition was difficult because we were in uncertain times and at the same time the way of taking classes changed. We changed from face to face to fully online suddenly and many students mentioned in the response that they didn't have a computer and the concentration in the process of learning in the household was stressful. In the survey 70 out of 90 respondents (78%) listed some type of technological challenge from access to a stable Internet connection to having sound and video for Zoom classes. Also, the 62% (56 out of 90) answered that the lack of resources such as not having internet, or a computer made it difficult for them to meet the requirements of the courses. One of the most challenging challenges that students mentioned was the distractions they have at home that don't allow them to focus. Distractions are a fact of remote learning. For example, students noted that having a dog, small children, and other family members at home made it difficult for them to concentrate and fulfill all responsibilities at the same time. As a result of these distractions, and possibly having additional responsibilities, managing time becomes more challenging. The students asserted that taking classes online had not been easy, and they wanted instructors to understand that not every household environment is conducive to learning. This was due to changes in daily routine and the way we communicate. The communication was totally converted through email and video. In addition, performance and academic performance decreased because of the situation that was experienced worldwide. On the other hand, many students had to put aside their studies for work, economic, mental health reasons and because they had to move out of state. It is interesting to observe in the results that despite the uncertainty and how difficult the entire adaptation process was and has been, it is possible to perceive the desire to move forward and the resilience in everyone.

Many students from low-income families lack the basic technology they need to study online, including access to a laptop and a reliable broadband connection, along with a quiet place in which to work and complete assessments.

The following outlines the most common obstacles or difficulties that students have encountered, along with the challenges that students have faced, and how student learning is severely impacted by the coronavirus.

Using technology: One of the most important tools required to take online classes is access to technology and connection to a good Internet network. However, one

of the many challenges that students have had to face due to the sudden transition from face-to-face to online has been the interruptions in the Internet connection or service. Technology is also prone to problems and does not always work as expected. In addition, many students have had to borrow a computer or buy one to meet the requirements of the classes. Not all of them have computers at home. This makes direct communication with them very difficult. Lack of Internet access may present a more difficult problem for some students. For many students, this is their first semester in college. Students commonly asserted that:

- “It was my first semester in college, and I didn’t know how to handle all the platforms.”
- “There were many times that I thought of dropping my classes due to the level of stress and anxiety experienced during remote learning.”
- “I have never worked with Blackboard Collaborate and other online virtual classroom platforms.”

Distractions: One of the challenges students have had to deal with is the distractions at home while taking classes online. Examples of distractions included television, cell phone, children, and family. This has contributed to the student being easily distracted. One of the students surveyed asserted that “...I really do not like classes online because I feel I don’t learn as much as in person, there’s too much distraction around me and there’s not a disconnection between home and school.” Most of the students stated that studying at home is not easy, especially if you do not have the appropriate environment. It is a challenge to concentrate when you have your family around. Students can face a difficult time succeeding in almost every area if they are not able to shut out distractions in their immediate environment. This is a great challenge for students because their focus tends to become fragmented.

Facelessness: Teaching online automatically makes you less visible than you would be in a traditional face-to-face environment. This can make students feel less connected with the instructor and raises the issue of how students perceive instructor presence in online courses, and how do online faculty demonstrate teaching presence in online instruction (Hemby, 2020). Students also assert that another difficulty is the limited contact with their classmates. In this respect, students also mention that one of the most annoying things is actually not having seen their classmates faces. Furthermore, students commented that “...it is a total challenge not being able to see teachers, meet them and generally interact with them; online courses are impersonal, and it is very difficult to create a student-teacher relationship. Likewise, due to the situation, we do not have the chance to meet our classmates, so in general we are alone with all the course workload.” This is a problem because in the virtual format, students can connect to the class but not necessarily be present, especially if they choose to not turn on their video

for privacy concerns or issues.

Feeling isolated and disconnected: A recent study by Crisostomo (2020) suggests that as a result of transition of classes from face-to-face to online, students are feeling more stressed, lacking motivation, and are struggling with minor mental health issues due to the isolation that online classes have brought on. In addition, things have not been easy at all for parents who have been left alone during this pandemic, and who have to continue working, studying for their courses, studying with the children, taking care of the household and other responsibilities. I perceive from students of online courses a lack of connection with their teachers. Hawke (2020) offers that "...school is not just about the curriculum, but the social aspect of connecting, and having relationships all be a part of the experience." Furthermore, students say they have no physical interaction with their friends or with other people. It also generates stress because they feel disconnected and isolated from the college (Gillet-Swan, 2017).

Time management: Time management skills are an ongoing problem for online learners with career, study, and family commitments. A student in one of my courses stressed that homework was also time-consuming, requiring almost two hours to compute all the major and minor details of every topic. The student spent a considerable amount of time at work, with two face masks on, doing homework between customers and often spending 60 hours a week at work, not including travel time, and time spent sanitizing themselves before entering their home. Effective time management requires students to analyze their workload, assign priorities, and maintain focus on productive endeavors. However, in the present environment, it has become most difficult to manage many of the activities and task that require our attention and still maintain a sense of balance with all other responsibilities.

Technical skills: Students are required to have basic technical skills to successfully navigate and complete online courses. However, many technical skills require training and practice to master. Yet, as a result of the sudden transition to online classes, many students lack the basic skills to manage some programs or applications. Lack of knowledge of some programs and/or applications creates anxiety and sometimes uncertainty for students because everything is online. The assignments, projects and reports must be submitted through the specific program or platform being used. The student must know how to use Word, Google Drive, Excel, navigate the Internet, Blackboard Collaborate and most recently Zoom, among others. Having acquired the knowledge and skills to handle these types of applications make the process of learning easier and contributes to student success in the online environment (Aragon (2002). For some students it is the first time that they make use of these applications in the course. Another problem that affects the student and their learning is the issue of compatibility. If the computer version

the student has available is not compatible with the system in use in the course, they will not be able to open or view class material or submit their assignments. A number of institutions have addressed this issue to some extent by implementing a “Student Loaner Program” where students are provided with a compatible computer on-loan on a semester-by-semester basis.

Lack of motivation: Due to the pandemic, some individuals may be experiencing a decline in their level of motivation because they are processing and are overwhelmed with a multitude of changes at the same time. A response that I receive practically daily is the lack of motivation and interest in fulfilling the requirements of the course. Students have expressed that the environment in the online classes have been very difficult and challenging, and they can’t wait to go back to normal face-to-face class meetings. They also add that they find it very difficult to stay focused during the class as compared to being in a classroom. For many students, it is a struggle to create a balance between the online school environment and life at home, and communicating with their teachers online. The challenges of online learning in terms of supporting and engaging the ‘isolated learner’ can be overwhelming for a novice instructor (Gillet-Swan, 2017). A specific aspect that stands out in the data collected, is that students prefer to avoid or by-pass asking questions in the online class, preferring to remain passive during instructor-student interactions. There is no doubt that the pandemic has created drastic changes in the student’s environment. Lack of motivation, and even low self-esteem – “I really can’t do this” - can directly impact student productivity and performance. The coronavirus has seriously and critically constrained or limited our lives in many unexpected ways, from freedom of movement to the way we work and congregate. These restrictions on our social norms or customs might contribute to a decline in motivation. These turbulent times is unlike anything any student or teacher has had to deal with. Improving or increasing motivation may prove to be difficult for students because they honestly feel overwhelmed and incapable of dealing with demands they face on a daily basis.

The major pedagogical challenges during this pandemic stem from the manner in which instructors seamlessly transfer their face-to-face course materials to the online environment. According to Choi and Park (2006), novice instructors find online courses involve a heavy workload, technology issues, and student-teacher interaction. The challenge to effectively transfer what is taught in the face-to-face modality to online continues to be a problem because not all courses are designed to be taught online. Anderson, Imdieke, and Standerford (2011), assert that they identified one of the main challenges as the disconnect between the way teachers were taught to teach, and how the course content must be delivered in an effective online classroom environment. This disconnect, while not new, does present a problem as many of the teacher education programs may not have yet caught up to the evolving online teaching environments. Another challenge outlined by

Anderson, et al., (2011) is the almost non-existence of institutional expectations for their online courses. These include expectations of teachers, students, courses, and staff.

Davis (1993) offers that students learn best when they are actively involved in their learning process. However, due to the transformation of education, the fact that the student is actively involved in learning has been a challenge for teachers because they have had to explore, examine and evaluate different alternatives in the teaching-learning process. Therefore, in this new and challenging educational environment, teachers have had to make adjustments in the evaluation process and teaching-learning pedagogy. The combination of creativity and flexibility has been key in the process of teaching-learning and evaluating students. “The ability of the instructor to communicate, form community, and deliver the appropriate lesson effectively makes all the difference in student learning outcomes” (Kebritchi, Lipschuetz, & Santiago, 2017, p. 19).

Conclusion

There is no doubt that the widespread of the Covid19 pandemic has brought unprecedented educational disruption with 1.2 billion students and youths across the planet affected by school closures (UNESCO, 2020). The online classes have increased levels of safety because students are at home and are not unnecessarily exposed to the Covid19 virus. However, it could still have an impact on students’ education. Teaching and learning online is a challenge, but when it is accompanied by a problem that has affected us all worldwide, the emotional and responsive part is changed or modified and, therefore, the teaching-learning process becomes much more difficult and challenging.

All students and teachers alike have been touched by the pandemic in one way or another. There are students who have lost relatives due to Covid19, others have lost their jobs and, in some cases, are now the sole source of income for their family. On the other hand, the shift from working to studying online from home is another big challenge for family members because there may be more than two people using technology for work or school. This entails major sacrifices because you must share the same computer or incur additional expenses to meet work and educational demands. Learning empathy, respecting diversity and being able to recognize and challenge discrimination are key skills that young people need to prevent societies from becoming even more polarized (UNESCO, 2020).

This has been a year of great challenges and lessons for each of us. Education has been one of the sectors that has had the greatest impact worldwide. Online teaching-learning technology continues to play an important role during this critical period in education. It is incumbent upon all of us to explore the full potential of online

teaching-learning technology, and seek to reinforce our skills to prepare us for future online teaching challenges.

The coronavirus pandemic could very well reshape education in the immediate future and future generations (Giannini, 2020). The Covid19 has demonstrated to us the importance of building resilience and community to face great challenges, and how to quickly adapt to rapid technological change in the post-pandemic Covid19 world. Also, it presents an opportunity to remind us of the skills teachers and students need in this unpredictable environment, skills such as decision-making, flexibility, empathy, emotional intelligence, creativity, and above all, adaptability in times of crisis.

References

- Aragon, S. R., Johnson, S. D., & Shaik, N. (2002). The Influence of Learning Style Preferences on Student Success in Online Versus Face-to-Face Environments. *American Journal of Distance Education*, 16(4), 227–243. https://doi.org/10.1207/s15389286ajde1604_3
- Bakir, N., Humpherys, S., & Dana, K. (2020, October). Students' Perceptions of Challenges and Solutions to Face-to-Face and Online Group Work. <https://files.eric.ed.gov/fulltext/EJ1258226.pdf>
- Bao, W. (2020). COVID -19 and online teaching in higher education: A case study of Peking University. *Human Behavior and Emerging Technologies*, 2(2), 113–115. <https://doi.org/10.1002/hbe2.191>
- Crisostomo, S. (2020, November 6). Online classes may cause feelings of isolation. *Philstar Global*. <https://www.philstar.com/online-classes-may-cause-feelings-isolation>
- Giannini, S., & Randolino, J. (2020, June 2). COVID-19 – Education is the bedrock of a just society in the post-COVID world. *United Nations Educational, Scientific and Cultural Organization*. <https://en.unesco.org/covid19>
- Gillett-Swan, J. (2017). The Challenges of Online Learning: Supporting and Engaging the Isolated Learner. *Journal of Learning Design*, 10(1), 20. <https://doi.org/10.5204/jld.v9i3.293>
- Hemby, V. (2020). Teaching presence in online courses. *Business Education Forum*, 74(4), 46-49.
- Kebritchi, M., Lipschuetz, A., & Santiago, L. (2017). Issues and Challenges for Teaching Successful Online Courses in Higher Education. *Journal of Educational Technology Systems*, 46(1), 4–29. <https://doi.org/10.1177/0047239516661713>
- Meador, D. (2019, February 18). 7 Factors that Make Teaching So Challenging. *Thought Co*. <https://www.thoughtco.com/factors-that-make-teaching-challenging-and-hard-4035989>
- UNESCO. (2020, March 13). COVID-19 educational disruption and response. *United Nations Educational, Scientific and Cultural Organization*. <https://en.unesco.org/themes/education-emergencies/c>

Caiman Pride © 2019

Prof. Michael Gosset

We're student-athletes, student comes first.
But on the court, we're ready to burst.
If our heads are on wrong and we need to get them right,
We look for new ways to reach new heights.

We start to think about what we'll do next,
And listen to our coach to help us reach our quest.
We look to be strong, and want to achieve.
Remembering who we are, helps us believe.

Who's the team to beat?
Hostos Caimans, the ones to defeat.
Caimans, Caimans, play in style.
Smelling a win, like a crocodile.

Dribbling, passing, shooting to score.
Teamwork makes it work, more, and more.
Pressure to win, bring it on.
A win is never a conclusion forgone.

Who's the team to beat?
Hostos Caimans, the ones to defeat.
Caimans, Caimans, play in style.
Smelling a win, like a crocodile.

Team-Based Learning: Perspectives from Multi-disciplinary Faculty

By Denise Cummings-Clay, Rayola Chelladurai, Linda Miles, Ronette Shaw, Elisabeth Tappeiner, and Joseph Carvalho

Have you considered using Team-based Learning (TBL) as part of your instructional methodology? Perhaps, reading about the methodology and the experiences of your colleagues who are using TBL will help you decide. The purpose of this article is to share the experiences of Hostos faculty using TBL from diverse disciplines in an attempt to promote student-centered learning and to spotlight a methodology that faculty can employ to encourage active learning of students in courses.

The first part of the article will describe features of TBL, its purpose, and its benefits. Attention will be given to TBL usage during the Pandemic and the promotion of TBL in face-to-face settings and the online modality. The second part of the article will share the experiences of faculty at Hostos/City University of New York who use the TBL methodology.

TBL is “a special form of small group learning using a specific sequence of individual work, group work, and immediate feedback to create a motivational framework in which students increasingly hold each other accountable for coming to class prepared and contributing to discussion” (Sibley & Ostafichuk, 2014, p. 6). Course content is separated into units that provide precise, foundational academic material in the TBL methodology (Parrish et al., 2021). For example, students prepare for classes and may review material post-lecture. Most often, the experience is positive. Students help each other and if there is a group that does not start positively, they learn to compromise, which simulates life in the workforce.

The first question that might arise is, “Why use TBL?” The definition of TBL points to the answer. “TBL is a collaborative active learning approach,” (Nawabi et al., 2021, p. 1081). “Active-learning approaches prioritize student interaction and engagement to create multidirectional flows of information” (Huggins & Stamatel, 2015, p. 228). TBL uses this perspective to foster learning through frequent collaborations (Huggins & Stamatel, 2015). TBL usage as a learning process can help students develop skills in critical thinking, effective communication, collaborative teamwork, and problem-solving (Nawabi et al., 2021). The general features of TBL that depict active learning include involving students in more than just listening, promoting skill development through exploration of academic content, engaging students in activities, and focusing student attitudes and values.

A glance at the business world can be applied to the education world. In an internal

study to ascertain how to form the perfect team in 2016, Google found that successful teams share five characteristics as follows (Doubet, 2022, p. 27):

1. Psychological safety – Team members feel safe to take risks and be vulnerable.
2. Dependability – Team members get things done on time and meet a high bar for excellence.
3. Structure and clarity – Team members have clear roles, plans, and goals.
4. Meaning – Team members find the work they are doing personally meaningful.
5. Impact – Team members think the work they are doing matters and creates change.

TBL can provide faculty and students with a context to which students can learn through connections with priorknowledge (Doubet, 2022). “Group-worthy tasks capture the attention of students and keep them focused and productive. They set the stage so that there is reason to take risks, room for diverse and meaningful group roles, and purpose for reflection and evaluation” (Doubet, 2022, p. 30).

With respect to the health profession, TBL design provides the forum to preparing learners as they transition into the dynamic health profession with confidence (Moore, 2015). TBL has been identified as an innovative teaching strategy designed to provide a forum for students to engage in collaborative, group based interactive learning to promote problem solving, enhance critical thinking and prompt team engagement (Zingone, 2010). TBL addresses the increasingly diverse student population in acknowledging the value of each individual as an essential member interacting through peer-to-peer engagement. Recognizing students as lifelong learners, the nursing academic community embraces the TBL model to offer students a proven approach to instruction that may translate into all settings to support student-faculty interaction (Whittaker, 2015).

TBL and the Effect of the Pandemic

When learning shifted to the online modality during the Pandemic, 65 percent of teachers revealed that they decreased the amount of group work for which they previously had engaged with their students, according to a national survey (Schwartz, 2021). The teaching and learning context, at best, was considered unsettling. What we know now is that adapting TBL to the online modality may result in the same learning opportunities for students associated with TBL in face-to-face settings (Parrish et al., 2021).

TBL improved both student performance and retention when TBL effectiveness was examined within an asynchronous course (Palsole & Awalt, 2008). Moreover, adapting TBL in a synchronous course in the virtual classroom – similar to TBL

in the face-to-face context with student and faculty interacting simultaneously, has been found to create a sense of connectedness between learner and instructor (Peterson et al., 2018). It was found that in the synchronous modality, students who engaged in thinking analytically shared more ideas, encouraged their group, expressed confidence in their group contributions, and were more likely to take academic risks (Peterson et al., 2018). The instructor provision of a checklist for each unit including the assignment due dates was important to students, which they noted helped them to organize their time and prepare to meet deadlines (Bolliger and Martin, 2018). Instructors' prompt constructive feedback was designated as critical in the online modality (Bolliger & Martin, 2018).

The Integrated Online-Team-Based Learning Model

Although TBL is used effectively in face-to-face settings, there is a model designed to help faculty usage of TBL online entitled, the "Integrated Online-Team-Based Learning Model" (IO-TBL) (Parrish et al., 22). Its goal is to apply TBL online "by leveraging the benefits of both asynchronous and synchronous instruction, while in-turn, mitigating the challenges associated with each" (Parrish et al., 2021, p. 475).

Initially, students retrieve their materials and objectives of their unit through the learning management system (Parrish et al., 2021). The professor provides questions that align with the unit materials (Parrish et al., 2021). Moreover, the professor gives a focused lecture to clarify the unit materials. The teams then are given about a week to ask any personal questions or requests for more information via a survey online (Parrish et al., 2021). As in a course that meets face-to-face, the balance of the synchronous session engages the teams in Application Activities. In this process, the teams meet in virtual breakout rooms to collaborate and answer the professor-provided questions (Parrish et al., 2021). "Once all teams return from their breakout rooms, answers are simultaneously reported, and the instructor facilitates cross-team discussions," (Parrish et al., 2021, p. 476). Application Activities are designed in two ways. In the first design, each student completes the Application Activity twice – first independently, and then a second time as a team (Parrish et al., 2021). The second design calls for teams to craft a product or do something that results in a learning outcome (Parrish et al., 2021). When teams meet outside of class, they usually work on more than one Application Activity (Parrish et al., 2021).

TBL Usage at Hostos

With respect to TBL at Hostos, usage is viewed as advantageous to faculty as it is evidence-based andragogy (art of teaching adult learners) that improves attendance, increases pre-class preparation, fosters better academic performance, and develops interpersonal and team skills. For faculty operating a flipped classroom, TBL supports learning in small groups of 4-7. Students who participate in a flipped classroom are more willing to participate in class and to work together to gain a

deeper understanding of the material, according to research. Distinct options have been used to make activities work through teams including:

1. Same Problem – Teams work on the same problem, case, or question.
2. Significant Problem – Teams work on a problem, case, or question demonstrating a concept’s usefulness.
3. Specific Choice – Teams use course concepts to make a specific choice.
4. Simultaneous Report – Teams report their choices simultaneously showing the visibility of student thinking.

Sharing insight about her experience using TBL methodology, Dr. Cummings-Clay (Education Department) revealed that she assigns teams and the specific content for each team to review. Typically, the academic content to be reviewed is from the modules of the course Open Educational Resources (OER). After each team reviews and/or analyzes educational content, each team reports its findings to the entire class. Finally, the class discusses the overall topic/theme to identify knowledge gaps and/or to answer questions coming out of the discussion. With respect to each team, Dr. Cummings-Clay defers to each team to choose the roles of its members. Team roles can include the following:

- Leader – Navigates the work of the group.
- Recorder – Writes down the information that the group discovers for reporting.
- Presenter/Reporter – Presents to the class on behalf of the group.
- Researcher – Researches the topic from educational materials.

Dr. Cummings-Clay has used TBL in the face-to-face classroom and in the online synchronous modality. “I have found TBL to be **engaging** for students in both modalities,” she says. She has found it useful to ask students to change their roles periodically so that each team member gains the opportunity to gain experience in multiple roles.

Students have engaged in the TBL activities in Dr. Cummings-Clay’s class sessions. During their deliberations in class in formed groups in the classroom or in the breakout rooms online, she circulates among the teams to listen to how they share information and engage in dialogue about the academic content. “During my time with each team, the other teams can request me to join them to answer any questions they might have or for me to interpret the academic content for them in a more succinct manner,” Dr. Cummings-Clay says.

In other instances, the individual teams meet outside of the scheduled class time to prepare their team presentations to the class. “Problems have surfaced when team members failed to participate or carry their weight on the team, which has frustrated the remaining team members,” Dr. Cummings-Clay reveals. “However,

these members usually have informed me privately that they learned how to be patient through the experience and that the team developed strategies to encourage participation of their team members.”

Dr. Linda Miles and Professor Lisa Tappeiner (Library) utilize TBL in their information literacy capstone course. Students work in teams during most class periods. During the three-week introductory module for the course, teams are constituted randomly, and students become accustomed to working in teams. They also have an opportunity to get to know other students in the class very well. By week four, teams are assigned based on students’ interest in a specific Capstone Project topic. This final project is scaffolded across the following nine weeks of teamwork activities, supplemented by individual exercises along the way. In early iterations of the course, Miles and Tappeiner invited students to designate which Capstone Project topic interested them, but this led to uneven teams and caused instances of perceived unequal workload. More recently, students were asked to designate their first three choices. The two professors then engaged in matchmaking based on the results. This helps them to make sure that teams are evenly constituted.

The coordination of teamwork in Professors Miles’s and Tappeiner’s course are determined by course modality, as they began teaching this course online during the height of the COVID-19 emergency. Because of the team-based design of the course, this online course is run synchronously. Teamwork worksheets are mounted in Google drive. In their breakout rooms during class, team members discuss the questions. All team members are able to edit the document simultaneously, and instructors view their progress on these documents, live during the session. They are able to drop into the breakout rooms to address apparent misunderstandings and encourage active participation in the deliberations. One of the team members is responsible for downloading the worksheet and submitting it through Blackboard by the deadline later that evening.

Each teamwork activity is a low-stakes, for-credit assignment worth one point. Professors Miles and Tappeiner use these as an opportunity for formative assessment. If students’ responses evidence apparent misunderstandings about course content, they receive a half-point credit, copious comments from the instructors, and an opportunity to revise and resubmit for full credit. This also helps Miles and Tappeiner design the teamwork “debrief” discussions that take place during the following class session, where they are able to directly address course content that students find most confusing. Near the end of the semester, teams are responsible for compiling and presenting their Capstone Project. Although everyone on a team receives the same grade for teamwork activities—including this higher-stakes assignment, students are asked to initial sections of the daily teamwork worksheets and of the final project where they contributed in a significant way. This represents an effort to strike a balance between cultivating an ethos of teamwork

and ensuring that individuals are held accountable and recognized for their contributions.

Professors Miles and Tappeiner drop in on teams in their Zoom breakout rooms as they are working, and students can “call” the instructors for help from within the room if they have questions, but Miles and Tappeiner are not always around when interactions go sour for the team. Resentments can build up if these interactions go wrong; this can be counterproductive, to say the least. If things have escalated, it can be difficult for a team to recover and move forward in a functional way. When this situation occurred during a recent semester, Professors Miles and Tappeiner assigned an individual reflective exercise for all students, concerning what team members’ behavior was like when things were going well, and this fueled a discussion during class. In future semesters, they plan to institute a teamwork exercise early in the semester that directly addresses team dynamics and individual behavior—presenting specific scenarios and asking team members about strategies for moving forward from those situations. This will at least bring the topic, as an issue, into class discussions, something that was not covered during previous semesters.

Professor Chelladurai (Allied Health) utilizes TBL in various courses; however, TBL has been developed and revised most in her Quality Assurance Course. This course is centered on testing radiographic equipment in the radiographic lab and determining if the equipment is working in the way it is intended to work. In addition, students learn various tests that they can utilize to check the x-ray equipment in the lab and how to assess equipment in actual clinical settings when they join the workforce.

Professor Chelladurai utilizes TBL when she has students work together in the lab in groups/teams. The students must prepare for the lab by looking over the material they are provided on Blackboard. A student ready for the lab will know what tests they are performing and why they are performing the test. The student should also understand what accessory equipment will be needed to complete the test, and the student must know the acceptable limits for each test to determine if their test on the equipment has passed or failed. Once the lab test is completed, the group is required to work together as a team and comprise a cohesive lab report that will be submitted before the next lab. Professor Chelladurai does not grade the lab report. However, the information will either pass or fail. If the words fail to meet Professor Chelladurai’s expectations, the team will work together to revise the report and resubmit it.

Feedback from students about TBL has been mostly positive; however, there are common complaints that the student would prefer to work alone and would not like to rely on others to complete a task. At this point, the student is reminded

that in real-life scenarios, especially working in health care, they will have to work in a team, so learning to do so in the classroom will be beneficial to them. Another often-heard complaint is that the student does not believe that everyone in their team contributes to the lab and often submits subpar material. To help alleviate this issue has created a contract that states which student will be responsible specifically for which aspect of the lab report. Students are required to sign off on the contract prior to starting to work on the lab report. Also, to be fair, students rotate their role for each lab report. The contract also states a deadline for submitting work to the team leader. The team leader in the past had stated that they often received dribs and drabs of material at the last moment. This contract stated the lead student has to receive the contribution from team members by a specific deadline, so that the team leader will have enough time to look over the report and submit it as a cohesive report, the grammar and formatting should look like there was only one author. The contract is submitted along with the report to the instructor. The contract has proven to be a helpful tool in TBL.

When beginning TBL, the instructor has to determine how they wish to create their groups. Professor Chelladurai decided to let the students' clinical assignment dictate the assignment of the TBL group members. Students at the same clinical setting stay in the same group for the TBL lab. The rationale is that students could still discuss the material from Quality Assurance during their down time at their assigned clinical rotation.

LAB REPORTS CONTRACT

I understand that the lab reports are a group effort. In order to excel in the lab, I will have to contribute to the lab. Each lab report has a different "Group Leader" who will ensure that the report is put together in a professional manner. The Group Leader will check for grammar and formatting.

Every person in the group will contribute to various aspects of the lab report. All members will have to submit their efforts (**which should be typed and checked for accuracy and grammar**) no later than the Sunday following the lab **in order to** give the Group Leader enough time to finalize the report prior to submission.

Each lab report **must** have this contract attached at the beginning of each lab report.

TITLE OF LAB: _____

ROOM: _____

GROUP MEMBERS:

1. _____
2. _____
3. _____
4. _____
5. _____
6. _____

	Name(s)	Signature
GROUP LEADER:		
PURPOSE:		
PROCEDURE:		
FREQUENCY:		
EVALUATION OF RESULTS:		

Quality Assurance: Lab Reports Contract

Dr. Shaw indicated that within the demands of today's healthcare system, professional reliability has direct impact on patient safety. Nursing programs receiving state accreditation are authorized to prepare students through the rigors of both clinical and theoretical instruction based on evidence-based research that permits students to pursue licensure and successfully enter into professional practice, according to Dr. Shaw.

“Nurses in the field today are faced with an increasing patient population in addition to various chronic diseases, pandemics and mental health concerns demonstrate and increasing need for educators to properly socialize students for professional practices,” Dr. Shaw says. “Nurses are expected to provide direct patient care within the established scope and practice standards while considering the quality through critical thinking and skills to plan and apply safe patient care when providing clinical decisions. Nurses are expected to work alongside other disciplines, within an interdisciplinary team to provide comprehensive medical care. Effective engagement to support safe patient care and positive healthcare outcomes can be achieved through teamwork.”

Dimitriadou, Pizirtzidou and Lavdaniti (2013), discussed the importance of socialization in the field of nursing reflected through internalizing the experience therefore influencing the care provided. Teamwork in nursing has been a part of the culture of the profession. “We begin team projects in the nursing program upon entry through promoting activities such as group presentations, study groups and clinical groups,” Dr. Shaw says. “Many teams are designed through the instruction of faculty and students have been noted to form teams independently for the purpose of academic engagement.”

TBL applied in the LPN certificate program at Hostos Community College includes constructing teams for learning activities such as clinical groups, simulation, and group assignments. An example of the application of TBL applied in the simulation setting has been done to prepare students for in-person clinical experience through practice sessions in the simulation environment. Within the simulation setting, students have the opportunity to practice skills and receive feedback from both their peers and nursing faculty. The size of the groups for each team may range from two to three or four to six students depending on the assignment in the simulation laboratory and to decrease distraction while improving management of student assignments for the faculty. Faculty prepare students for each assignment prior to the scheduled simulation activities and provide assigned readings of each topic, including literature to review, videos and pre-simulation roles for each team participant. Faculty may designate one student as the lead for the team who assumes the responsibility of collecting completed assignments. Each team member will have the opportunity to demonstrate the skill with faculty present to facilitate learning and participate in a post-stimulation briefing. Team members play an essential role to providing members with support, engage in constructive dialogue

and prompt critical thinking while working together to complete the assignment.

Faculty provide feedback on group progress, which is done informally with indications for any improvement if needed. The students have reported having a positive experience within the group settings, learning from their peers, gaining a wider perspective on topics based on the group interactions and building a sense of collegiality that can be transferred into the clinical site. Trouble shooting within the dynamics of a team is also important for the students to learn as they progress through the program into professional practice and learn how to navigate difficulties they may face as a member of the team or how to address conflict in a diplomatic way. The student has faculty present to facilitate a productive learning environment and along with team evaluations, students are individually assessed on skills at the end of the semester for proficiency as a course requirement prior to advancing to the next course.

Turning from the health profession to the Arts, Professor Joseph Carvalho utilizes TBL in his Digital Music courses to give students an opportunity to strengthen their Program Learning Outcomes and soft skills. He also recommends TBL because it best reflects how the music industry works. Students must collaborate together to produce something they are all equally proud of by voicing their opinions and compromising on creative decisions. At the end of the process, the final product must speak for itself. Students are given class time to work but most assignments will require the teams to organize a session at the studio on campus outside of class. Professor Carvalho says, “The students are having fun with a TBL approach to these assignments and learning how to become better creative collaborators through the process.”

Faculty are urged to consider TBL usage. It is deemed to be an effective framework for which to promote active learning and collaborative learning in higher education, especially in face-to-face settings (Parrish et al., 2021). Moreover, a model (i.e., IO-TBL) can provide an algorithm to help faculty who wish to adapt TBL to the online asynchronous and synchronous modalities. Remember, the goal is the promotion of active learning for students.

References

- Bolliger, D. U. & Martin, F. (2018). Instructor and student perceptions of online engagement strategies. *Distance Education*, 34(4), 568-583.
- Dimitriado, A., Pizirtzido, E., & Lavdaniti, M. (2013). The Concept of Socialization in Nursing Education. *International Journal of Caring Sciences*, 6(3), 314-318.
- Doubet, K. (2022). Reviewing Collaboration in Classrooms. *Educational Leadership*, 79(8), 24-30.
- Huggins, C. M., & Stamatel, J. P. (2015). An exploratory study comparing the

effectiveness of lecturing versus team-based learning. *Teaching Sociology*, 43(3), 227-235. <https://doi.org/10.1177/0092055X15581929>

Moore-Davis, T., Schorn, M., Collins, M., Phillippi, J. & Holey, S. (2015). Team-Based Learning for Midwifery Education. *Journal Of Midwifery & Women's Health*, 60(3), 291-297.

Nawabi, S., Bilal, R., & Javed, M. Q. (2021). Team-based learning versus traditional lecture-based learning: An investigation of students' perceptions and academic achievements. *Pak J Med Sci.*, 37(4), 1080-1085. Doi: <https://doi.org/10.12669/pjms.37.4.4000>.

Palsole, S., & Awalt, C. (2008). Team-based learning in asynchronous online settings. *New Directions for Teaching and Learning*, 116, 87-96. <https://doi.org/10.1002/tl.336>.

Parrish, C. W., Guffey, S. K., Williams, D. S., Estis, J. M., & Lewis, D. (2021). Fostering cognitive presence, social presence, and teaching presence with integrated online—team-based learning. *Tech Trends—Association for Educational Communications & Technology*, 65, 473-484.

Peterson, A. T., Beymer, P.N., & Putnam, R. T. (2018). Synchronous and asynchronous discussions: Effects on cooperation, belonging, and affect. *Online Learning*, 22(4), 7-25.

Samuel, J. & Hinson, J. (2010). Online asynchronous team-based learning: A phased design to enhance student performance. In D. Gibson & B. Dodge (Eds.). *Proceedings of SITE 2010—Society for Information Technology & Teacher Education International Conference* (pp. 2366-2370). San Diego, CA, USA: Association for the Advancement of computing in education (AACE).

Schwartz, S. (2021). How to make teaching better: 8 lessons learned from remote and hybrid learning. *Education Week: Technology Counts*, 40(30), 8-10.

Sibley, J. & Ostafichuk, P. (2014). *Getting started with team-based learning*. Sterling: Stylus Publishing.

Whittaker, A. (2015). Effects of team-based learning on self-regulated online learning. *International Journal of Nursing Education Scholarship*, 12(1), 1-16.

Zingone, M., Franks, A., Guirguis, A., George, C., Howard-Thompson, A. & Heidel, R. (2010). Comparing team-based and mixed active-learning methods in an ambulatory care elective course. *American Journal of Pharmaceutical Education*, 74(9), 1-160.

Endocrinopathies and Insulin Resistance Can Cause Type-2 Diabetes Mellitus.

Soheli Chowdhury^{1*}, Majeedul H. Chowdhury².

1. Hostos Community College, The City University of New York (CUNY).
2. Touro University, LAS Division, Flatbush Campus, NY 11230.

Introduction:

In 150 AD, the Greek physician Aretaeus described what we now call diabetes as “the melting down of flesh and limbs into urine.” From then on, physicians began to gain a better understanding about diabetes. The first known mention of diabetes symptoms was in 1552 B.C., when Hesy-Ra, an Egyptian African physician, documented frequent urination as a symptom of a mysterious disease that also caused emaciation. The word “mellitus,” meaning honey, was added to the name “diabetes,” meaning siphon. Indian Ayurveda physicians called it madhumeha (‘honey urine’) because it attracted ants. The ancient Indian physician Sushruta, and the surgeon Charaka (400–500 A.D.) were able to identify the two types of Diabetes mellitus, later to be named Type I and Type II diabetes (1).

Diabetes mellitus (DM) is a disease caused by a deficiency in the effects of insulin that leads to the failure of glucose uptake and metabolism in peripheral tissues. DM is of two types: Type-1 diabetes mellitus (T1DM) and Type-2 diabetes mellitus (T2DM). T1DM is called insulin-dependent diabetes mellitus. The pathogenesis of the T1DM involves T cell-mediated autoimmune destruction of β -cells of the endocrine pancreas. Consequently, insulin can no longer be synthesized or be secreted into the blood, and it leads to hyperglycemia. T2DM is called non-insulin-dependent diabetes mellitus, where the primary failure is a loss of insulin sensitivity of the tissues, which is often accompanied by reduced insulin secretion, leading to insulin resistance (IR). T2DM pathogenesis is not well understood but reduced population of islet beta-cells, reduced secretory function of islet beta-cells that survive, and peripheral tissue IR are known to be involved (2). T2DM is characterized by increased glucagon hormone secretion, which is unaffected by, and unresponsive to the concentration of blood glucose. But insulin hormone is still secreted into the blood in response to the blood glucose. As a consequence, hyperglycemia ensues, because glucagon promotes hepatic glucose output by increasing glycogenolysis and gluconeogenesis and by decreasing glycogenesis and glycolysis in a concerted fashion via multiple mechanisms (3).

Beta cells of the pancreatic islets are sensitive to blood sugar levels so that they secrete insulin into the blood in response to high level of glucose, in a fed state, and inhibit secretion of insulin when glucose levels are low, in a fasted state. Insulin

enhances glucose uptake, via glucose transporter or GLUT, and metabolism in the cells, thereby reducing blood sugar level. Alpha cells of the pancreatic islets secrete glucagon into the blood in the opposite manner: increased secretion in hypoglycemia, and decreased secretion in hyperglycemia. Glucagon increases blood glucose level by stimulating glycogenolysis and gluconeogenesis in the liver. The secretion of insulin and glucagon into the blood in response to the blood glucose concentration is the primary mechanism of glucose homeostasis (4, 5).

In this review T2DM has been discussed with reference to the regulation of intermediary metabolism by insulin, signal transduction by insulin, endocrinopathies that can precipitate T2DM, and insulin resistance (IR).

Regulation of intermediary metabolism by insulin: Insulin, an anabolic peptide hormone, is produced by beta cells of the pancreatic islets and encoded in humans by the INS gene. It regulates the intermediary metabolism of biomolecules by promoting the absorption of glucose from the blood into liver, adipocytes, and skeletal muscle cells. The absorbed glucose is converted into glycogen (liver and muscle) and triglycerides (liver and adipocytes). Circulating insulin also affects the synthesis of proteins in a wide variety of tissues. This anabolic hormone promotes the conversion of small molecules in the blood into large molecules inside the cells. Gluconeogenesis in the liver cells is strongly inhibited by insulin and proinsulin (16,17). However, low insulin levels or its absence in the blood have the opposite effect by promoting widespread catabolism, especially of reserve body fat and protein (5, 6).

Signal transduction by insulin: Insulin is a key homeostatic factor that plays a cardinal role in maintaining postprandial normoglycemia. It acts through both the insulin receptor for metabolic regulation, and insulinlike growth factor 1 receptor (IGF-1R) for normal growth and development. Insulin, proinsulin, and epidermal growth factor (EGF) use high-affinity cell surface receptors, the receptor tyrosine kinases (RTK), for signal transduction mechanism to regulate intracellular activities. The author reported that proinsulin, the prohormone precursor to insulin made in the beta cell of the islets of Langerhans of the pancreas, manifests effects similar to insulin on metabolic pathways, but with much less efficiency. EGF, on the other hand, counteracted the glycogenic effects of insulin in parenchymal hepatocytes in culture. To understand the signal transduction mechanism, in insulin receptor binding studies, it was noted that proinsulin binds with insulin receptors, albeit less effectively. However, EGF did not share the same subset of RTK receptors, which perhaps explain its counteraction of insulin's glycogenic effect (16,17). Today approximately 20 different RTK classes have been identified; EGF receptor family belongs to RTK class I whereas insulin receptor family to RTK class II. This difference of RTK class explains their differences in signal transduction mechanism.

Insulin and IGF-1 acting via specific tyrosine kinase receptors propagate signals via two main branches: the PI3K-PDK-1-Akt and the Grb2-SOS-Ras-MAPK pathways that control proliferation, differentiation, and survival at the cellular level, and growth and metabolism in organisms (PI3K: Phosphoinositide 3-kinase; PDK-1:3-phosphoinositide-dependent protein kinase; Akt: Protein kinase B; Grb2: Growth Factor Receptor-bound protein 2; SOS: son-of-sevenless protein, a guanine nucleotide exchange factor for Ras activation; Ras: from “Rat sarcoma virus”, Ras proteins, called small GTPase, function as binary molecular switches controlling intracellular signaling networks; MAPK: mitogen-activated protein kinase). Identifying new molecules that impact insulin-signaling and new levels of control, as well as better understanding the causes and mechanisms leading to insulin resistance (IR), will be essential for a more effective treatment of type-2 diabetes and associated diseases (19).

Role of endocrinopathies in the genesis of T2DM: Many metabolic hormones and their interactions help maintain normoglycemia. Blood glucose concentration is increased by glucagon, catecholamines, growth hormone and glucocorticoids, without insulin. They affect two metabolic pathways: Glycogenolysis is facilitated by glucagon, catecholamines and growth hormone; and gluconeogenesis is increased by glucagon, catecholamines and glucocorticoids.

Endocrinopathies can cause insulin resistance, leading to the genesis of hyperglycemia, and can precipitate T2DM.

Growth hormone: Acromegaly is an endocrinopathy when there is an excessive amount of growth hormone (GH) that causes hyperglycemia, through gluconeogenesis in liver and its decreased utilization in peripheral tissues. This is probably due to disturbances in the production and action of a second messenger in the insulin receptor. In addition, GH increases lipolysis of adipose tissue, and an increased concentration and oxidation of fatty acids enhances IR (7, 8).

Prolactin: Hyperprolactinaemia is a condition where an excessive amount of prolactin hormone being produced, and it can cause IR (9). The chemical structure of prolactin is similar to the structure of growth hormone and placental lactogen hormone. Together, they form the “prolactin/growth hormone/placental lactogen” family. All hormones in this family derive from a common ancestral gene. Prolactin’s structure being very similar to that of GH, both resistance and carbohydrate disorders will be present under such conditions. Hyperprolactinaemia also cause hypogonadism, and the anti-dopaminergic effect of hyperprolactinaemia promote weight gain and the occurrence of the atherogenic lipid profile (7, 10).

Glucocorticosteroids: Glucocorticoids (GCs) is a very large class of hormones, and an excessive amount of them can lead to IR, abdominal obesity, increased accumulation of body fat, higher blood pressure, lipid disorders, glucose

intolerance, or diabetes. The mechanisms underlying the relationship between GCs and diabetes are not fully understood. What remains clear is that GCs are capable of regulating aspects of glucose homeostasis in each target organ by antagonizing the effects of insulin either directly or indirectly (11). In hypercortisolism, glucocorticoids cause insulin resistance by affecting the activation of the liver enzyme phosphoenolpyruvate carboxykinase (PEPCK), increasing proteolysis in skeletal muscle and lipolysis in adipose tissue, which ultimately provides more substrate for gluconeogenesis, leading to hyperglycemia. Enhanced lipolysis leads to the development of reduced insulin sensitivity. Insulin resistance induced by hypercortisolism has a post-receptor nature. Cortisol also reduces expression of the adiponectin gene, which reflects good insulin sensitivity (7). All of this can lead to hyperglycemia.

Hypo- and Hyperthyroidism: The presence of disorders of carbohydrate metabolism has been demonstrated in thyroid disease involving either overt hyperthyroidism or overt hypothyroidism. The severity of the disease is proportional to the severity of these disorders. The possible influence of subclinical forms of both hyperthyroidism and hypothyroidism on carbohydrate disorders is still under discussion. Thyroid hormones have a significant effect on glucose metabolism and the development of insulin resistance (IR). In hyperthyroidism, impaired glucose tolerance may be the result of mainly hepatic insulin resistance, whereas in hypothyroidism the available data suggests that the insulin resistance of peripheral tissues prevails (12). Hyperglycemia in hyperthyroidism is mainly due to endogenous glucose production by gluconeogenesis. Studies examining insulin-stimulated glucose metabolism in skeletal muscle suggest that, in the hyperthyroid state, it may be of primary importance to increase the rates of glycolysis and lactate formation relative to glucose oxidation in muscle in order to provide substrate for gluconeogenesis (increase Cori cycle activity). This effect will be achieved primarily by a decrease in glycogen synthesis and an increase in glycogenolysis. In addition to lactate, increased rates of gluconeogenesis in hyperthyroidism can also be sustained by increased plasma concentrations of amino acids (mostly glutamine and alanine) and glycerol (13). Hypothyroidism, on the other hand, causes weight gain, atherogenic lipid profile, an increase in blood pressure, and also an increased blood concentration of free fatty acids. The latter reduces the tissue uptake of glucose, and its enhanced oxidation. Hypothyroidism leads to an increased production of counter-regulating hormones with potentially diabetogenic properties such as cortisol, catecholamines, and glucagon. Hypothyroidism leads to insulin resistance due to triiodothyronine (T3) action at the tissue leads to activation of AMP-kinase, which is responsible for increased glucose utilization, reduced lipolysis, and gluconeogenesis (7).

Insulin Resistance (IR) in T2DM: A cardinal feature of T2DM is IR. This occurs primarily at the level of insulin-sensitive tissues, viz., liver, muscle, and fat, and

can be caused by multiple mechanisms, such as hyperglycemia, hyperinsulinemia, lipotoxicity, inflammation, genetic mutation, mitochondrial dysfunction, and endoplasmic reticulum stress (19). IR is a pathophysiological state related to the decreased response of peripheral tissues to the insulin action, hyperinsulinemia and raised blood glucose levels caused by increased hepatic glucose outflow. All the above precede the onset of full-blown type 2 diabetes. Two major putative mediators that cause IR are ceramides and diacylglycerols. Accumulation of these two intramuscular lipids is proposed to be involved in the induction of IR (14).

Diacylglycerol (DAG) is an important lipid that serves both as an intermediate in lipid biosynthetic pathways and can act as a signaling molecule by activating protein kinase C (PKC). The mechanism of action of DAG-mediated IR is as follows: DAG activates PKC isoforms, and activation of the ϵ isoform (PKC ϵ) is most consistently observed in insulin-resistant (IR) liver. PKC ϵ phosphorylates insulin receptor (INSR) Thr1160, resulting in inhibition of INSR tyrosine kinase activity. All downstream arms of hepatocellular insulin signaling, including stimulation of net glycogen synthesis, transcriptional upregulation of de novo lipogenic genes, and transcriptional downregulation of gluconeogenic genes, are predicted to be affected by this mechanism (15).

Another strong causation for IR is the sphingolipid ceramide. However, it causes IR by a mechanism very different from that of DAG. Ceramide can block insulin in two ways. One is that the ceramide activation of protein kinase C (PKC) impairs the translocation of protein kinase B (PKB), a serine/threonine kinase, to the plasma membrane, preventing PKB from being able to function in insulin action. PKB is a key regulator of insulin signaling and glucose homeostasis. Impaired PKB function leads to insulin resistance and diabetes mellitus. The other way ceramide blocks insulin is that the ceramide activation of protein phosphatase 2A leads to dephosphorylation and inactivation on PKB (15).

Conclusion: In this article the role of insulin resistance and endocrinopathies in the development of T2DM has been addressed. The basic aspects of T2DM have been discussed, viz., the causative factors, role of pancreatic islets hormones, insulin and glucagon, in maintaining glucose homeostasis and regulation of intermediary metabolism, role of endocrinopathies that cause hyperglycemia leading to T2DM, and insulin resistance that precede the development of T2DM. T2DM treatment could be achieved with 3Ds: Diet (low sugar, balanced diet), Discipline (physical exercise), & Drug (medication to lower sugar). Comprehensive diabetes management can delay the progression of complication and maximize the quality of life. Acquiring knowledge about T2DM is an essential part of diabetes management, and even more important is to make the patient aware of this chronic disease. “For a diabetic patient, knowledge and understanding are not a part of treatment--they are the treatment” (18).

References:

1. Lakhtakia R. The history of diabetes mellitus. *Sultan Qaboos Univ Med J*. 2013;13(3):368-370. doi:10.12816/0003257. PMID: 23984020
2. Goyal R, Jialal I. Diabetes Mellitus Type 2. 2021 Sep 28. In: *StatPearls* [Internet]. Treasure Island (FL): StatPearls Publishing; 2022 Jan-. PMID: 30020625
3. Jiang G, Zhang BB. Glucagon and regulation of glucose metabolism. *Am J Physiol Endocrinol Metab*. 2003 Apr;284(4): E671-8. doi: 10.1152/ajpendo.00492.2002. PMID: 12626323.
4. Koeslag JH, Saunders PT, Terblanche E. A reappraisal of the blood glucose homeostat which comprehensively explains the type 2 diabetes mellitus-syndrome X complex. *J Physiol*. 2003 Jun 1;549(Pt 2):333-46. doi: 10.1113/jphysiol.2002.037895. Epub 2003 Apr 25. PMID: 12717005.
5. Stryer L (1995). *Biochemistry* (Fourth ed.). New York: W.H. Freeman and Company. pp. 773–74. ISBN 0-7167-2009-4
6. Voet D, Voet JG (2011). *Biochemistry* (4th ed.). New York: Wiley. ISBN 01218-2211-7.
7. Rogowicz-Frontczak A, Majchrzak A, Zozulińska-Ziółkiewicz D. Insulin resistance in endocrine disorders - treatment options. *Endokrynol Pol*. 2017;68(3):334-351. doi: 10.5603/EP.2017.0026. PMID: 28660991.
8. Jeffcoate W. Growth hormone therapy and its relationship to insulin resistance, glucose intolerance and diabetes mellitus: a review of recent evidence. *Drug Saf*. 2002;25(3):199-212. doi: 10.2165/00002018-200225030-00005. PMID: 11945115.
9. Tuzcu A, Bahceci M, Dursun M, Turgut C, Bahceci S. Insulin sensitivity and hyperprolactinemia. *J Endocrinol Invest*. 2003 Apr;26(4):341-6. doi: 10.1007/BF03345182. PMID: 12841542.
10. Al-Chalabi M, Bass AN, Alsalman I. Physiology, Prolactin. 2021 Jul 29. In: *StatPearls* [Internet]. Treasure Island (FL): StatPearls Publishing; 2022 Jan-. PMID: 29939606.
11. Bauerle KT, Harris C. Glucocorticoids and Diabetes. *Mo Med*. 2016 Sep-Oct;113(5):378-383. PMID: 30228504.
12. Gierach M, Gierach J, Junik R. Insulin resistance and thyroid disorders. *Endokrynol Pol*. 2014;65(1):70-6. doi: 10.5603/EP.2014.0010. PMID: 24549605.
13. Dimitriadis GD, Raptis SA. Thyroid hormone excess and glucose intolerance. *Exp Clin Endocrinol Diabetes*. 2001;109 Suppl 2: S225-39. doi: 10.1055/s-2001-18584. PMID: 11460573.
14. Sokolowska E, Blachnio-Zabielska A. The Role of Ceramides in Insulin Resistance. *Front Endocrinol (Lausanne)*. 2019 Aug 21; 10:577. doi: 10.3389/fendo.2019.00577. PMID: 31496996.
15. Petersen MC, Shulman GI. Roles of Diacylglycerols and Ceramides in Hepatic Insulin Resistance. *Trends Pharmacol Sci*. 2017 Jul;38(7):649-665. doi: 10.1016/j.tips.2017.04.004. Epub 2017 May 24. PMID: 28551355.

16. Agius L, Chowdhury MH and Alberti KG: Regulation of ketogenesis, gluconeogenesis and the mitochondrial redox state by dexamethasone in hepatocyte monolayer cultures. *Biochem J* 239: 593-601, 1986. PMID: 3827816.
17. Chowdhury MH and Agius L: Epidermal growth factor counteracts the glycogenic effect of insulin in parenchymal hepatocyte cultures. *Biochem J* 247: 307-314, 1987. PMID: 2827626.
18. Imam K. Management and treatment of diabetes mellitus. *Adv Exp Med Biol.* 2012; 771:356-80. doi: 10.1007/978-1-4614-5441-0_26. PMID: 23393690.
19. Boucher J, Kleinridders A, Kahn CR. Insulin receptor signaling in normal and insulin-resistant states. *Cold Spring Harb Perspect Biol.* 2014 Jan 1;6(1): a009191. doi: 10.1101/cshperspect. a0009191. PMID: 24384568.

When Everyone and Everything Moved Online: My Reflections on Transitioning to Online Learning and Teaching

Asrat G. Amnie, MD, EdD, MPH, MBA. Assistant Professor, Education Department

When the coronavirus pandemic descended on the planet in the Winter of 2020, it upended our daily routines of work, life, and leisure. Schools, colleges, and universities transitioned to remote learning. Meetings, conferences, and conventions had to be conducted through virtual platforms. Houses of worship had to live-stream their services to reach their congregants. Major sports events had to be canceled or postponed. From birthday parties to funeral services—and everything in between, including graduation and wedding ceremonies—life’s biggest moments had to be moved online. The pandemic brought everyday life to a grinding halt for months on end, with COVID-19 excess mortality ranking as a top three leading cause of death in the U.S. ¹ The immediate consequences and long-term ramifications on lives and livelihoods in all sectors, including the economy, business, education, and healthcare are unfathomable.

The advent of the pandemic ushered in a tectonic shift toward digital learning in schools, colleges, and universities, paving the way to a new normal. As a result of the pandemic—with millions of lives and livelihoods lost—the world we live in has already changed so much that the prospect getting back to the pre-pandemic way of life is uncertain. Some researchers are warning that the pandemic is threatening to reverse several decades of economic progress. ²⁻⁴

As colleges and universities across the U.S. moved their classes online in March of 2020, students in many colleges were told to pack and go home. Likewise, halfway through the semester, in-person operations ceased in the main and our classes had to torpidly transition to fully online courses. During the transition our college operationalized college-wide online learning initiatives, provided educational resources, access to the technological processes, online skills development training, overall support, and technical assistance to faculty. Our online learning initiatives provided me an excellent platform for experience-sharing and a great opportunity to serve and to learn new skills as a course developer, faculty mentor, and course evaluator.

In the time period from Spring 2020 through Fall 2021, I designed four online courses and received certification to teach them online. I have completed and submitted progress reports on 19 courses being developed to fully online by other faculty members. I have completed a total of 46 course evaluations for courses being developed to fully online. I also participated in the CUNY-WGU Collaborative Online Faculty Development Summer 2020 workshop on

the pedagogy and technology of online learning, the Spring 2021 CUNY SPS Online Teaching Essentials Workshop, and the CUNY Hyflex Summer 2021 seminar. These workshops and seminars provided participant faculty important resources and training, which helped them to acquire new skills for the integration of pedagogy and technology. Also, the workshop was focused on effective best practices, principles of excellence in design, high impact discussion strategies, and provided guidance to students for research online.^{5,6}

The process of developing an online course consists of the important components outlined in the online learning initiatives guidelines. These are defining expectations, providing resources and student support, creating course design and student-friendly online environment, establishing communication to ensure interaction and engagement, and providing assessment and feedback. An effective online instruction presupposes the seamless integration of effective experiences and best practices to meet online course requirements. The pedagogical dimension of online course development is entirely left to the discretion of the instructor. As a matter of fact, striving for instructor presence online is the most fundamental of all the best practices and principles because presence at the course site defines instructor involvement at the essential factor in the teaching-learning process. Students will have higher learning outcomes when instructors strive for online presence, make themselves broadly available, and pursue human-hearted, instructor-powered, student-driven learning and teaching.

Providing balanced, timely, specific, and frequent feedback is beneficial to students. Feedback should be personalized to improving performance by addressing three areas: what students did well, what students need to improve on, and how to make this improvement. Feedback can take a variety of forms: 1) formative/summative, 2) individual/group, 3) written/coded comments, and 4) using charts/rubrics for coursework assessment. Besides peer observations and student evaluation of teaching, a dynamic teaching methodology would be enriched by continued informal feedback and comments from students about teaching effectiveness. Student feedback and comments become an impetus for continuous improvement in instructional delivery. A flexible, tailored approach to learning constitutes the basis for applying personalized learning. Broadly defined, the term personalized learning refers to “a diverse variety of learning experiences, instructional approaches, and academic-support strategies that are intended to address the distinct learning needs, interests, aspirations, or cultural backgrounds of individual students.”^{7,8} It is the tailoring of pedagogy, curriculum and learning platforms to meet the needs and learning styles of individual students. Personalization is more comprehensive in scope than just individualization or differentiation in that it provides the student a menu of options to make informed choice about what is learned, when it is learned and how it is learned.⁹ In the context of online learning, first, it is important to overcome any cognitive inertia and go through a skills development process.

Second, make every attempt to intentionally integrate technology and pedagogy into the course design. Third, work to achieve sustained, authentic, and effective student interactivity during instructional delivery.

Every effort should be made on the part of the instructor to provide a learning environment that is exciting, interactive, and attractive to students. To begin with, the stage has to be set for cultivating a classroom culture where students feel safe, accepted, included, and free to engage in learning through discussion and dialogue. It will make learning more productive when the instructor provides clearly articulated instructor presence schedule and anticipated response time for student questions and communication preferences. A learning space hallmarked by mutual trust and respect presupposes a degree of self-awareness and learning to monitor and manage interactions with students. A good measure of patience and visceral compassion on the part of the instructor, and being flexible with assignment due dates, and providing make-ups for justifiably missed coursework improves student engagement and learning outcomes while continuing to nudge each of them with great kindness to stay engaged!

Setting standards and fine-tuning student expectations from the outset is a smart undertaking. The inclusion of online etiquette in course shell development and adherence to the pre-set code of conduct help to ensure a learning space where dignity and respect for student peers and professor prevail. Students with accessibility needs are properly accommodated in online classes through the application of tools designed to provide the needed support and assistance. The instructor communicates to students that the assessment parameters are designed to reflect academic performance, and not the extraneous personal, and social circumstances of students. Research indicates that student factors account for 68% of academic failures whereas life/socioeconomic factors and factors related the educational system account for the balance.¹⁰

Thus, the prevailing personal, and social circumstances have their share of impact on student engagement and learning outcomes.

Students need to have access to optimum technology requirements to successfully complete an online class. One notable challenge is the digital divide that exists across demographic variables in communities. Awareness of the digital disparity between those who have ready access to computers and the Internet, and those who do not have it helps to provide information to those students in need of resources that could be made available by the College or affiliate organizations. A general consensus points to the fact that the future of higher education is online and technology will be the predominant learning space. Sad to say, for many students from disadvantaged communities, the future of education is also on the line because of perpetual existence of the digital divide as one of the factors for

racial achievement disparities, and other structural social and economic inequalities, including income, health, housing, and neighborhood disparities. Therefore, it is imperative to invest in digital inclusion. Digital inclusion in education refers to the activities necessary to ensure that all students have access to technology and the necessary skills to use educational technology resources and benefit from their use in ways that are personally meaningful and relevant. This includes having access to (1) affordable high-speed internet service; (2) internet-enabled devices such as computers and tablets that meet the needs of the user; (3) digital literacy training and quality technical support; and (4) applications and online content designed to enable and encourage self-sufficiency, participation, and collaboration. ¹¹

Needless to say, online courses could be either fully online or hybrid. Hybrid courses combine both an online and a brick-and-mortar in person classroom component. Online courses are delivered via the Internet in either synchronous or asynchronous formats. Synchronous learning is online learning that happens in real time, whereas asynchronous learning occurs online without real-time interaction.¹²⁻¹⁴ Asynchronous learning allows a student to follow the curriculum at their own pace without having to worry about scheduling conflicts. A fully online course or the online portion of a hybrid course may also be either synchronous or asynchronous or may be designed to have both components (i.e., a mixed mode of instruction).

A Hybrid-Flexible or HyFlex course is a model of class delivery that can integrate in-person instruction, online synchronous video sessions, or asynchronous content delivery. A Flex-Sync (allow me to rename it Sync-Flex and make it rhyme with HyFlex) is a much more comprehensive model of instruction designed to provide a flexible learning solution using advanced technology.¹⁵ The online learning could be a course-level or a program-level online learning. In a program-level online learning, degree and certificate programs can be designed either as fully online or partially online with a mix of traditional and online learning courses in order to serve student populations who have different levels of access to campus.¹⁶

In conclusion, online mode of instruction has rapidly transitioned from being just an option to becoming the modus operandi of teaching and learning in higher education. Thanks to effective Covid-19 vaccines and appropriate public health measures, in just about a couple of years since the advent of the pandemic, epidemiologic projection are showing sign of the outbreak abating. The resumption of in-person classes will make possible the delivery of the full package of collegiate experience to students. Even post-pandemic, online learning will continue to be an important delivery mode of education. Therefore, competence in the design, development, and delivery of online instruction will continue to be crucial going forward. The application of best practices in instructional design and delivery, student counseling, academic advisement, and technology support will have an

added layer of positive influence toward ensuring student engagement and improving learning outcomes. The acquisition of adequate course level online teaching skills across the board will also pave the way for the potential initiation of program-level online teaching, making it possible for students to start and complete their degree programs fully online. Finally, a personalized digital learning initiative such as a digital literacy education across the curriculum based on student digital skills assessment may facilitate e-learning and contribute to improving career prospects for students in this ever-evolving digital society.

References

1. Peterson-KFF. (2020, October 21). The pandemic's effect on the widening gap in mortality rate between the U.S. and peer countries . Retrieved from <https://www.healthsystemtracker.org/brief/the-pandemics-effect-on-the-widening-gap-in-mortality-rate-between-the-u-s-and-peer-countries/>
2. Ahmed, K.(2020, April 9).Coronavirus could turn back the clock 30 years on global poverty. Retrieved from <https://www.theguardian.com/global-development/2020/apr/09/coronavirus-could-turn-back-the-clock-30-years-on-global-poverty>
3. John Hopkins University & Medicine. (2020). COVID-19 Dashboard by the Center for Systems Science and Engineering (CSSE) at Johns Hopkins University. Retrieved from <https://coronavirus.jhu.edu/map.html>
4. Walsh, B. (2020, May 6). How the coronavirus could throw global progress in reverse. Retrieved from <https://www.axios.com/how-the-coronavirus-could-throw-global-progress-in-reverse-5f6619cb-4226-4afa-8c15-4bc3b3329dc0.html>
5. CUNY. (2020). The City University of New York-Western Governors University Collaborative Online Faculty Development: Helping Bring the Classroom to the Screen: Faculty Support for Course Design and Student Engagement in the Online World. Accessed at<https://www.cuny.edu/academics/faculty-affairs/faculty-development-across-cuny/cuny-wgu-collaborative-online-faculty-development/>
6. Stanford University (2019). Providing timely and frequent feedback. Retrieved from <https://tomprof.stanford.edu/posting/1288>
7. Great Schools Partnership. (2013). The glossary of education reform. Retrieved <https://www.edglossary.org/student-voice/>

8. Great School Partnerships. (2015). Personalized Learning. Retrieved from <https://www.edglossary.org/personalized-learning/>
9. Talent LMS. (2020) Synchronous e-learning vs. asynchronous e-learning tools and technologies. Retrieved from <https://www.talentlms.com/ebook/elearning/synchronous-vs-asynchronous-elearning>
10. Horton, J. (2015). Identifying at-risk factors that affect college student success. *International Journal of Process Education*, 7(1), 83-101.
11. Digital Inclusion Alliance. (2020). Digital Inclusion. Retrieved from <https://www.digitalinclusion.org/definitions/>
12. Kurt, S. (2018, May 18). Fully and partially online courses: Definitions, Educational Technology. Retrieved from <https://educationaltechnology.net/fully-and-partially-online-courses-definitions/>
13. University of Colorado Boulder. (2020). Hybrid Course Design. Retrieved from https://www.colorado.edu/asset/faculty-resources/resources/hybrid-course-design#cu_faq-entity_view_1-0
14. Online Learning Consortium. (2015). Online Learning Consortium Insights: Updated eLearning Definitions. Retrieved from <https://onlinelearningconsortium.org/updated-e-learning-definitions-2/>
15. Minnesota State University (2022). FlexSync Class Rooms. Available at <https://mankato.mnsu.edu/coronavirus/return-to-learn/course-delivery-and-definitions/flexsync-classrooms/>
16. The Best Schools. (2018, January 31). Synchronous Learning vs. Asynchronous Learning in Online Education retrieved from <https://thebestschools.org/magazine/synchronous-vs-asynchronous-education/>

We Learn from Reflecting on Experience

Mayra Mojica Butler, Lecturer, Business Department

Remote teaching has not altered my teaching perspective as an educator in accounting. Instead, it has only elevated the intensity to reach out to my students, to help them embrace knowledge, and to learn from the disruption. The experience lived during the pandemic has also opened new ways for us to connect and to learn from each other. For instance, during the fall 2021 semester I invited a guest who delivered a presentation on: “Money Lessons and Budget for College Students”. The lecture was presented to students via Zoom, presenting the importance of working on a budget during tough times. This was a way to provide useful information connecting the class with reality issues and the challenges that we had to live through the pandemic. My group of students were riveted as they listened and engaged with the speaker through his knowledge and experiences. The understanding of the issues and consequences during the pandemic had taught us to adapt to changes, by seeking new ways of teaching in order to follow our goals and to achieve our objectives.



Poems

By Juan Soto-Franco, English Department Adjunct Lecturer
Hostos Community College, Fall 2020

Disfruta de un Ritmo Lento

En este mundo tan turbulento,
Nada mejor que un ritmo lento
Para balancear la vida nuestra.
Llegar así al alma, es un extra.

Esta melodía suave me relaja.
El piano toda mi tensión baja.
Y me concentro en esa pieza
Que pone a flotar mi cabeza.

Ese teclateo sobre las blancas
Y negras, me lleva sobre ancas
A espacios de pura serenidad
Donde me relajo con libertad.

Por más tenso que sea tu día,
Escucha alguna lenta melodía
Para que relajes tus tensiones
Y se equilibren tus emociones.

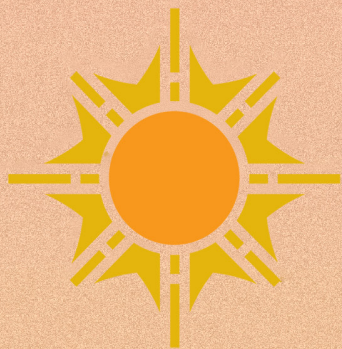
Solid, Liquid, Gas: Flexible as Water

Before the pandemic and during the crisis,
Being flexible as water resembles an oasis.
Students enjoy it when professors extend
Deadlines of assignments for the weekend.

They also show their bona fide gratitude,
When in the middle of this ironic solitude,
Professors divide their office hour in two
To dissolve stress and check what is due.

By being flexible, we can be as solid as ice
Without taking away the fun of being nice.
As liquid, we aid students rinse their sorrow.
We spray hopeful gas of a better tomorrow.

What matters, like the states of the matter,
Is to be flexible so students climb the ladder
With our assistance and become successful
In a world that has become more stressful.



Hostos

Community College



The Professor Magda Vasilov
Hostos Community College
500 Grand Concourse
Bronx, NY 10451