National Architectural Accrediting

Architecture Program Report

New York City College of Technology
City University of New York

Date: September 07, 2024

NAAB

Architecture Program Report-Initial Accreditation

2020 Conditions for Accreditation
2020 Procedures for Accreditation

Institution	New York City College of Technology
Name of Academic Unit	Department of Architectural Technology
Degree(s) *(check all that apply)* **Track(s)** *(Please include all tracks offered by the program under the respective degree, including total number of credits. Examples:* *150 semester undergraduate credit hours* *Undergraduate degree with architecture major + 60 graduate semester credit hours* *Undergraduate degree with non-architecture major + 90 graduate semester credit hours)*	☒ Bachelor of Architecture Track: ☐ Master of Architecture Track: Track: ☐ Doctor of Architecture Track: Track:
Application for Accreditation	**Continuing Accreditation**
Year of Previous Visit	2022
Current Term of Accreditation	Initial Accreditation
Program Administrator	Jieun Yang + Claudia Hernandez-Feiks, B. Arch Co-directors
Chief Administrator for the academic unit in which the program is located *(e.g., dean or department chair)*	Sanjive Vaidya- Chair, Department of Architectural Technology
Chief Academic Officer of the Institution	Pamela Brown, Ph.D., P.E., Provost and Vice President for Academic Affairs
President of the Institution	Russell K. Hotzler, Ph.D.- President
Individual submitting the APR	Jieun Yang+ Claudia Hernandez-Feiks, B. Arch Co-directors
Name and email address of individual to whom questions should be directed	Sanjive Vaidya- SVaidya@citytech.cuny.edu Jieun Yang - Jyang@citytech.cuny.edu Claudia Hernandez-Feiks- CHernandez@citytech.cuny.edu

Submission Requirements:

- The APR must be submitted as one PDF document, with supporting materials
- The APR must not exceed 20 MB and 150 pages
- The APR template document shall not be reformatted

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INTRODUCTION

Progress since the Previous Visit (limit 5 pages)

In this Introduction to the APR, the program must document all actions taken since the previous visit to address Conditions Not Met and Causes of Concern cited in the most recent VTR.

The APR must include the exact text quoted from the previous VTR, as well as the summary of activities.

SC.5 Design Synthesis

VTR Comments:

> **SC.5 Design Synthesis**—How the program ensures that students develop the ability to make design decisions within architectural projects while demonstrating synthesis of user requirements, regulatory requirements, site conditions, and accessible design, and consideration of the measurable environmental impacts of their design decisions. (p. 12)
>
> ☒ **Not Met**
>
> **2022 Team Analysis:**
> The team found a significant inconsistency in student work in terms of meeting this SC at the ability level, in both ARCH 3512 Architectural Design V and 3612 Architectural Design VI. The student work did not demonstrate the ability to synthesize all the aspects of design integration included in the SC description. In particular, accessible design (beyond ADA requirements for bathrooms) and the measurable environmental impacts of design decisions were not found in the vast majority of student projects

Initial Accreditation Letter Comments:

> *This criterion is not met. The program did not provide sufficient information to meet the requirements of this criterion. The program provided evidence of student ability in user requirements and site conditions but needs to provide consistent evidence of design synthesis at the level of ability across all projects integrating all parts of this criterion, including regulatory requirements, accessible design beyond ADA compliant bathroom and the measurable impacts of design decisions.*

Guided by the comments provided in both the VTR and Initial Accreditation Letter, we have taken the following actions and strategies to address the concerns cited in the most recent VTR to meet the criteria of SC.5 Design Synthesis.

In our curriculum, SC.5 Design Synthesis is addressed at the "ability" level during the 6th semester in ARCH 3612: Architectural Design Studio. To address comments, we have taken these actions:

In April 2023, upon receiving the Initial Accreditation Letter, the full-time faculty convened to review the comments. At that time, we decided to remove the SC.5 criteria from ARCH 3512 and focus our efforts on developing the curriculum of ARCH 3612 to better address the SC.5 criteria highlighted in the comments.

Following the full-time faculty meeting, the Department Chair, B. Arch Co-Directors, and ARCH 3612 Course Coordinator met to discuss the criteria and develop a plan to address the comments. It was decided that each criterion would be defined more clearly within the context of the course, and a series of exercises would be created to specifically address each one.

A series of specific exercises were developed during the summer of 2023 and were implemented in all ARCH 3612 sections in Fall 2023 and refined over the Winter of 2024. The updated versions were implemented during the Spring of 2024. It's important to note that the exercises were tailored to address regulatory requirements, accessible design beyond ADA-compliant bathrooms, and the measurable impacts of design decisions.

To address concerns regarding the inconsistency in levels of design synthesis across all projects among students, the course coordinator adopted and implemented, during the 23/24 academic year, a new course schedule and outline to dedicate the final two weeks of the semester to clearly document findings.

At the end of the Fall 2023 semester, student work was archived and closely reviewed. During the winter recess, the assignments were further refined and distributed in the Spring 2024 semester.

For updated assessment please refer to section 3.1 SC.5

SC.6 Building Integration

VTR Comments:

> **SC.6 Building Integration**—How the program ensures that students develop the ability to make design decisions within architectural projects while demonstrating integration of building envelope systems and assemblies, structural systems, environmental control systems, life safety systems, and the measurable outcomes of building performance. (p. 12)
>
> ☒ **Not Met**
>
> **2022 Team Analysis:**
> Also for this SC, the team found a significant inconsistency in student work in terms of meeting the criterion at the ability level in ARCH 4812 Architectural Design VIII. The building envelope systems and assemblies were found well developed across the examples, and the measurable outcomes of building performance were found in most projects. However, structural systems and life safety systems were superficially, and thus not sufficiently, addressed. In particular, most projects did not show a developed, analyzed, and integrated structural system. Furthermore, environmental control systems (beyond solar radiation and natural lighting control systems) were not considered as part of building design integration.

Initial Accreditation Letter Comments:

> *This criterion is not met. The program did not provide sufficient information to meet the requirements of this criterion. The program provided evidence of the integration of building envelope and assemblies but needs to provide consistent evidence at the level of ability across all projects for integration of all parts of this criterion, including structural systems, environmental control systems (specifically HVAC), and life safety systems.*

Similarly, with respect to SC.5, we have developed specific steps and strategies guided by the comments in both the VTR and Initial Accreditation Letter to meet the criteria of SC.6 Building Integration.

In our curriculum, SC.6 Building Integration reaches the "*ability*" level through the combination of two courses ARCH 4812 Architectural Design Studio VIII and ARCH 4781 Structures III. To address the comments, we have undertaken the actions listed below and formulated a plan to address the concerns cited in the VTR and decision letter:

In April 2023, upon receiving the Initial Accreditation Letter, the full-time faculty convened to review the comments. At that time, it was determined that the curriculum of ARCH 4812 would be further developed to better address the SC.6 criteria highlighted in the comments. Additionally, it was decided to include the student work of ARCH 4781 Structures III as evidence, which was not part of the submission during the last visit. In ARCH 4781 students master structural analysis and design through a combination of lectures and the production of a capstone project. The final submission includes drawings, details, and calculations to resolve a simple building with a long-span structure. Students utilize building code-based performance criteria such as live and dead loads, wind load, snow load and seismic load to develop accurate structural components, connections, and systems. We believe that the criteria for SC.6 are more comprehensively met between these two courses rather than solely in ARCH 4812 Architectural Design VIII.

In addition to incorporating the student work from the Structures III, during the summer of 2023, the ARCH 4812 Architectural Design VIII course material was revised to further address the comments. Each criterion was defined further for clarification, assignments were developed, and a rubric was created addressing each item. The intention is to ensure coverage of all outlined criteria and address concerns related to inconsistency in meeting the criteria.

Throughout the fall of 2023, the revisions to ARCH 4812 were implemented in all course sections. At the end of the semester, student work was archived, closely reviewed, and assessed. During

the winter recess, where necessary, the assignments were further refined and distributed during the Spring 2024 semester.

As part of our long-range plan to strengthen and develop more robust strategies to meet the criteria of SC.6 Building Integration, we intend to invite course coordinators and faculty from other accredited institutions who have successfully met the criteria to present and discuss their approaches. The goal is to gain clarity and insight not only how to meet the criteria but also in how to apply it in a way that supports our program's mission. We have already reached out to Cal Poly San Luis Obispo's Associate Department Head, Carmen Trudell, and have initiated conversations to coordinate a meeting during the 24/25 academic year.

Additionally, to further strengthen SC.6 the department is considering the addition of a new required 3-credit course to be taught in conjunction with ARCH 4812. The course would focus on different building systems typologies and approaches, discussing them as design opportunities within the context of the building design developed in ARCH 4812. We formally presented the idea during our January 2024 full-time faculty meeting and have started to investigate a structure to accommodate this curriculum change.

For updated assessment please refer to section 3.1 SC.6

5.5 Social Equity, Diversity, and Inclusion
Initial Accreditation Letter:

5.5 Social Equity, Diversity, and Inclusion

The program must demonstrate its commitment to diversity and inclusion among current and prospective faculty, staff, and students. The program must:

5.5.1 Describe how this commitment is reflected in the distribution of its human, physical, and financial resources.

5.5.2 Describe its plan for maintaining or increasing the diversity of its faculty and staff since the last accreditation cycle, how it has implemented the plan, and what it intends to do during the next accreditation cycle. Also, compare the program's faculty and staff demographics with that of the program's students and other benchmarks the program deems relevant.

5.5.3 Describe its plan for maintaining or increasing the diversity of its students since the last accreditation cycle, how it has implemented the plan, and what it intends to do during the next accreditation cycle. Also, compare the program's student demographics with that of the institution and other benchmarks the program deems relevant.

5.5.4 Document what institutional, college, or program policies are in place to further Equal Employment Opportunity/Affirmative Action (EEO/AA), as well as any other social equity, diversity, and inclusion initiatives at the program, college, or institutional level.

5.5.5 Describe the resources and procedures in place to provide adaptive environments and effective strategies to support faculty, staff, and students with different physical and/or mental abilities.

This Condition is not met. The program did not provide sufficient information to meet the requirements of this Condition. The program provided sufficient evidence of compliance with 5.5.4 and 5.5.5 but needs to provide evidence of 5.5.1 commitment as demonstrated by distribution of human and financial resources; 5.5.2 plan for maintaining a diverse faculty; and 5.5.3 plan for maintaining or retaining diversity of students.

After reviewing the comments included in the Initial Accreditation Letter, we believe our department meets this criterion but failed to include adequate information to reflect compliance. Please refer to sections 5.5.1 – 5.5.3 in this report with updated information.

• 5.6 Physical Resources
Initial Accreditation Letter Comments:

5.6 Physical Resources

The program must describe its physical resources and demonstrate how they safely and equitably support the program's pedagogical approach and student and faculty achievement. Physical resources include but are not limited to the following:

5.6.1 Space to support and encourage studio-based learning.

5.6.2 Space to support and encourage didactic and interactive learning, including lecture halls, seminar spaces, small group study rooms, labs, shops, and equipment.

5.6.3 Space to support and encourage the full range of faculty roles and responsibilities, including preparation for teaching, research, mentoring, and student advising.

5.6.4 Resources to support all learning formats and pedagogies in use by the program.

If the program's pedagogy does not require some or all of the above physical resources, the program must *describe the effect (if any) that online, off-site, or hybrid formats have on digital and physical resources.*

This Condition is not met. The program did not provide sufficient information to meet the requirements of this Condition. The program provided evidence of future plans for moving forward to meet compliance but needs to provide evidence of how it safely and equitably supports the program's pedagogical approach and student and faculty achievement.

The department has implemented structural initiatives and changes that target immediate outcomes and long-range planning with the continued work of the Facilities Committee to assess current and future classroom layout, furniture, and equipment needs. (Refer to Facilities Survey and Technology Survey) The department's new Technology Committee aims to identify and implement the latest relevant technologies necessary to assist learning and teaching, determine the order of magnitude for ongoing equipment maintenance, and find cost-effective and efficient maintenance and purchase options. The department's first-ever fundraising event in December 2022 raised approximately $60K to support the department's program and facility needs.

5.6.1 Space to support and encourage studio-based learning

The second-floor classrooms (V-205 and V-207) were reconfigured in Fall 2023 with movable desks to provide flexible forms of learning for the first-year students. Utilizing the *Transformational Initiative Funding Grants for College Plans, an OTPS (Tax Levy budget),* the college is supporting the departments plan to further develop V-205 & V-207 into a Smart Lab. This funding is intended to replace outdated computer equipment and will include audio visual equipment to establish a digital presentation hall, seating 80-90 people, as well as subdividable classroom space. The college has engaged a classroom designer to meet with Department representatives to review usage, layouts, materials and equipment. Pursuant to these meetings a final budget is under development.

The department has created similar "double" classrooms on the eighth floor (V-812 and V-814), shared by two studio sections to increase exposure to peer-based learning and feedback. This enhances the studio environment, encouraging the exchange of teaching pedagogy between instructors, including joint pin-ups and reviews. The department is moving away from fixed workstations and has provided new moveable furniture with power in these rooms to provide flexibility and support our students' preference for laptops. A few fixed workstations will remain to accommodate students without laptop access. These two rooms are being tested as a prototype for other classrooms. If this new layout proves successful, the department will move to reconfigure the rest of our classrooms in a similar fashion.

The department continues to look for solutions to provide more storage space for the students, including shelving in the first-year studios for models *(a request to the college to purchase and install shelving was submitted)* and benches with integrated storage were donated in Spring 2024. The benches are distributed in the eighth-floor hallway to create social space and personal storage spaces for the students. We are currently developing a system to distribute access to the students. The department has also designed communal bar-height tables for our studio classrooms to be used for model-making and model storage. We hope to procure these in the next academic year.

5.6.2 Space to support and encourage didactic and interactive learning, including lecture halls, seminar spaces, small group study rooms, labs, shops, and equipment

Students congregate and collaborate in the fabrication lab (V-813) throughout the day. The act of construction and assembly draws students together. Interactive learning is enhanced by student Fab Lab monitors trained on specialized equipment and software The space is self-managed by

the students and open during the building's operational hours. The recently upgraded open faculty office (V-817) doubles as an informal meeting and seminar space. The previous women's bathroom space is being transformed into a centralized check-out kiosk for borrowed materials and equipment (including laptop loan – see 5.6.4).V-811 is proposed as a *Smart & Soft Space* for students to gather informally, holding club meetings and discussions between classes. The room redesign was recently discussed with the college CIO and facilities team to develop the design intent. Pursuant to these meetings a final budget is under development but will likely be supported by the *Transformational Initiative Funding Grants for College Plans*.

Newly expanded pin-up spaces on the third floor are open for informal pin-ups and structured final reviews supporting first-year classes. The department has also implemented a digital room/ pin-up wall booking interface to facilitate the needs of the class and students.

5.6.3 Space to support and encourage the full range of faculty roles and responsibilities, including preparation for teaching, research, mentoring, and student advising.

The department's open-plan faculty office, V-817, provides dedicated desks for full-time faculty, and hot desks, conference tables, and a printing station for all instructors to meet with colleagues and students. A few enclosed offices in V-818 serve as private conference and meeting rooms.

The Facilities Committee is looking to update the specifications for the classroom instructor station to ensure appropriate and effective access to teaching tools, including faculty laptops and access to educational software licenses.

5.6.4 Resources to support all learning formats and pedagogies in use by the program.

The department continues to provide a laptop loan program to support all students with required equipment, software, and online collaboration platforms regardless of financial barriers. Our laptop checkout kiosks have proven very successful and the department is looking to procure more kiosks facilitate student access to laptops and relieve the IT staff of the need to monitor the borrowing.

The newly completed ADA-compliant restrooms throughout the school have provided much-improved accessibility for the necessary amenities.

Dedicated IT personnel and more financial and physical resources have kept the Fabrication Lab open to pre-pandemic levels. Increased CLT (College Lab Technician) time has provided model-making and printing support for students. Laser cutters, 3D printers, and a recently acquired color plotter have helped foster student learning and studio culture. The department is looking into moveable LCD monitors for flexible digital presentations.

A recent material donation from the Brooklyn AIA, restocked the free and scrap model-making materials bin available to all students. Although the department continues to look for grants, donations, and fundraising opportunities, it also recognizes the limitations of self-initiated programs and continues to ask for more support from the college that determines the budget.

Program Changes

Further, if the Accreditation Conditions have changed since the previous visit, the APR must include a brief description of changes made to the program as a result of changes in the Conditions.

This section is limited to 5 pages, total.

Please note that our last visit was in 2022, curriculum changes to address the 2020 NAAB conditions were addressed at that time.

NAAB

1—Context and Mission

To help the NAAB and the visiting team understand the specific circumstances of the school, the program must describe the following:

The institutional context and geographic setting (public or private, urban or rural, size, etc.), and how the program's mission and culture influence its architecture pedagogy and impact its development. Programs that exist within a larger educational institution must also describe the mission of the college or university and how those shape or influence the program.

Program must specify their delivery format (virtual/on-campus).

Program Response:

New York City College of Technology (City Tech) is one of the largest public colleges of technology in New York State. With a Fall 2020 enrollment of 15,513 students, the highest among the City University of New York's (CUNY) senior colleges, it stands as a national model for technological education.

Since its founding in 1946 as the New York State Institute for Applied Arts and Sciences, City Tech has been a pioneer in technology-based education. Established in response to the emerging needs of business and industry, it provided highly trained technicians and other specialists to fuel a post-war economy marked by new inventions, industrial processes, and technologies. In 1953, oversight was transferred from the State to the City of New York and the institute was renamed New York City Community College. Eleven years later it became a part of the City University of New York (CUNY) system.

A second root of City Tech can be traced to 1881, when the Technical Schools of the Metropolitan Museum of Art were renamed The New York Trade School. That institution – which became the Voorhees Technical Institute many decades later – was a model for the development of technical/vocational schools worldwide. In 1971, Voorhees was incorporated into NYCCC and continued to offer two-year associate degrees.

In 2002, the college was renamed New York City College of Technology to keep pace with its new status as a senior college offering four-year programs. In the same year the Department of Architectural Technology was authorized to offer a four-year Bachelor of Technology (B. Tech) degree. In New York State, B. Tech degrees require a minimum of 30 credits of liberal arts. In its distinctive commitment to providing a strong general education in the liberal arts and sciences along with specialized technical training, City Tech requires 42 credits in liberal arts out of a total of 120 credits. By encouraging lifelong learning, this curriculum prepares students for challenging, high-level professional opportunities, and not merely for technical jobs.

The college has experienced a significant upward trend in its annual growth rate in the past decade. As of the Fall of 2024, we are close to 14,000 students enrolled across the college in various bachelor and associate degree programs, and that number continued to grow each year until the onset of the pandemic. The college has expanded its physical plant with the construction of a new 350,000 square-foot academic building equipped with state-of-the-art science and clinical laboratories, classrooms fully outfitted with the latest technologies, a 1000-seat auditorium and a fully serviced athletic facility. At the same time, the college continues to update its existing facilities. Voorhees Hall, the home of the Architectural Technology Department, recently received a new exterior curtain wall enclosure, a refurbished lobby and cafeteria, and updated elevators. Labs and studios in the department are continually upgraded with new equipment and software.

New York City College of Technology is fully accredited by the Board of Regents of the University of the State of New York and the Middle States Commission on Higher Education (3624 Market

Street, Philadelphia, PA 19104, 267-284-5000). Discipline-specific boards also accredit individual degree programs for several departments in the college.

COLLEGE MISSION STATEMENT

New York City College of Technology is a baccalaureate and associate degree-granting institution committed to providing broad access to high quality technological and professional education for a diverse urban population. City Tech's distinctive emphasis on applied skills and place-based learning built upon a vibrant general education foundation equips students with both problem-solving skills and an understanding of the social contexts of technology that make its graduates competitive. A multi-disciplinary approach and creative collaboration are hallmarks of the academic programs. As a community, City Tech nurtures an atmosphere of inclusion, respect, and open-mindedness in which all members can flourish.

COLLEGE EDUCATION GOALS

As a result of a City Tech education, students will:

- Develop knowledge from a range of disciplinary perspectives and hone the ability to deepen and continue learning.
- Acquire and use the tools needed for communication, inquiry, analysis, and productive work.
- Work productively within and across disciplines.
- Understand and apply values, ethics, and diverse perspectives in personal, professional, civic, and cultural/global domains.

The Department of Architectural Technology, at its founding as part of the Voorhees Technical Institute, provided a traditional two-year program in architectural drafting. At that time an associate degree was adequate for entry-level employment in an architectural office. In the building industry, graduates of the department were sought after for their work-related skills, in particular their ability to develop construction documents.

The Bachelor of Technology and the Associate of Applied Science degrees in Architectural Technology are the only programs of their kind in the CUNY system. The addition of the four-year Bachelor of Technology degree proved popular, and our student population expanded significantly, topping off near 900. Our current enrollment varies in the range of 700-800 students.

From 2009-2013 the department conducted a comprehensive review of the curriculum of both degrees, redesigning them to balance the demands of the workforce, technological focus, and to be more in line with NAAB requirements for an accredited degree. The updated degrees are more well-rounded, integrating the college's general education focus as well as placing greater emphasis on an integrated design process with a strong foundation in technical knowledge and cutting-edge tools training and skills development.

To support this new curriculum, the department hired four new full-time faculty, including some with significant areas of expertise, to enhance our offerings of specialized courses. In 2023-2024 we had one faculty member retire but hired two additional full-time faculty members to bring our total up to 21 full-time faculty members. The expertise of the full-time faculty allows us to offer courses covering topics of sustainability, high-performance building envelopes, digital fabrication, and advanced design. At the same time, we added a significant range of equipment including 3D printers, laser cutters, CNC mills, and robotic arms as well as thermal imaging cameras, 3D laser scanners, and other tools for examining existing buildings and their environmental performance. This equipment allows us to further enhance the knowledge and skills of our students through their integration into numerous courses.

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DEPARTMENT MISSION STATEMENT

The Architectural Technology Department provides an innovative, progressive, nurturing environment that prepares students for advanced education and employment in architecture and related fields. The Department aspires to produce graduates who are recognized leaders in the design and construction industry. The faculty provide an education in design, building technology, history, theory, and the environment through creative and scholarly investigation, leading edge computational tools, interdepartmental collaboration, and community-based learning. The Program Delivery format is on-campus.

Several unique factors have a significant impact on the learning culture at City Tech. First is the nature of the institution as an open enrollment commuter college. Open enrollment allows students of varying degrees of college preparedness to enroll in our program. Many students have long distance commutes, traveling over an hour on public transportation each way. The commute is time consuming, and the distance impacts access to campus resources such as the library and labs. The college does not currently provide 24/7 access, limiting the time students can work on campus each day. Additionally, many of our students have other responsibilities including jobs, or the care of children or elders, requiring them to be particularly efficient with their time. The combination of high enrollment and limited classroom and studio space requires high utilization rates of learning spaces, leaving students limited access to studio space outside of their class time while on campus. All these factors combine to make the learning culture in our department distinct from the architectural education culture typically found at residential colleges. These factors impact our studio culture, the sequence of the curriculum, and the camaraderie of the cohorts.

Our studio courses used to meet 2 days a week, with 4-5 credit hours allocated, translating to a range of 7-9 contact hours per week. As we set out to revise our curriculum, we studied our allocation of credits and contact hours in our studio courses and compared this to data we compiled from 27 B. Arch programs around the country. We found that our credit allocation was 77% of the average of other programs and our contact hours were only 66% of the average allocation. The limitations on class time due to low credit and contact hour allocations put more pressure on the students to execute significant amounts of their project work outside of class time, where they work without guidance or feedback from either faculty or the support of student peers. While some students were able to manage their out of class time well, others struggled to make a consistent effort outside the classroom, hampering their progress and level of achievement each semester. The high student to instructor ratio also limited the amount of one-on-one desk critique interaction that is necessary to the pedagogy of the design studio. Our assessment of the impact of these challenges provided the motivation to modify our design curriculum as part of our B. Arch. curriculum development.

In response, we submitted a curriculum change to our College Council in the Fall of 2019. This increased the credit allocation to 5 credits for design studios, resulting in 9 nominal lab hours in total divided into three class meetings each week for studios during the first two years: and twice a week, with longer meeting times, for the upper-level studios. We also reduced the number of students in each studio section, allowing for a better faculty to student ratio. Critical to student success, the longer and more frequent class contact hours allow students to execute more of their work in the supportive environment of the studio, helping to develop better design and time management skills. This higher allocation of studio credits expands our current effort to integrate knowledge from across the curriculum into studio work, an important pedagogical goal of our program where we place a high level of importance on building technology. This integrative approach to studio is enhanced by a wide range of workshops that offer students supplemental support in the development of their technical skills.

As commuters, our students need to focus on developing a more efficient time-management and work-school-life balance than students at residential colleges. This factors into the management of our students' studio workload and access to studio spaces. The department is not currently

contemplating pursuing a 24/7 environment, nor are the faculty promoting in any way the culture of the “all-nighter”. Instead, the department’s facilities committee developed a vision and plan for instructional workspace to address multiple teaching modalities and improve student access to digital resources. This includes the successful implementation of the Virtual Desktop Infrastructure (VDI), and the deployment of strategically selected online courses. An effort initially managed internally during the pandemic to provide our students with access to software to complete assignments, VDI is now integrated and supported centrally by the college CIS. Requests for additional funding to support this effort was made through the Capital Funding mechanism which funds major equipment and infrastructure upgrades. Furthermore, working with the department’s Master Course Scheduler tool, classroom resources throughout the campus are leveraged to improve supplemental instructional space on the 8th floor, and throughout, the Voorhees building.

The department reinforces the development of professional skills in communication, vocabulary, time-management, and general conduct throughout the curriculum. The department recognizes this as a critical aspect of the preparation of our students for the workforce.

The nature of our open enrollment student body with outside responsibilities such as employment and the need to support families, presents additional obstacles to the creation of a supportive learning environment. While each course type (design, building technology, history, environmental stewardship, and structures) is clearly sequenced, the inability for many of our students to maintain a full credit load creates challenges in our attempts to maintain synergies between learning as it occurs across these parallel subjects. To support the outside responsibilities of our urban commuter students, we look to offer flexible programming with sections of many courses available both during the day and in the evening. While our curriculum modifications seek to continue to find the right balance between a reinforced integrated sequence and flexibility, the final two years of the B. Arch degree require a tighter adherence to the sequence.

An important goal of our program is to develop additional support mechanisms to help maintain strong and supportive student cohorts. Residential colleges with 24/7 access to studios have the potential to create strong cohort bonds between students who spend long hours together. Contrary to the expectation that the urban commuter environment would minimize cohort bonding, we have found that the burden of this shared experience has increased the level of camaraderie and peer support among our students. Our students tend to develop efficient schedules that keep them on campus for extended periods of time, promoting greater opportunity to socialize and support each other. Due to existing space constraints these activities typically occur in the cafeteria or other informal study spaces that are carved out by our students. Additionally, our students have learned to make use of online collaborative tools such as Zoom, Slack and WhatsApp, to work together and keep them informed of studio activities and support camaraderie when not on campus. While cohort bonding is occurring, we seek to further facilitate this through the introduction of a series of events throughout the academic year that bring the cohorts together and encourages them to share their experiences and give feedback to the department. This includes a new cohort group advisement structure that assists our students’ understanding of the degree program options available to them and helps them to make better and more informed decisions. This also includes periodic Town Hall meetings that encourage broad attendance by the full student body and our full-time and part-time faculty. This allows the department community to build relationships and promotes a common sense of perspective and intention.

The program's role in and relationship to its academic context and university community, including how the program benefits–and benefits from–its institutional setting and how the program as a unit and/or its individual faculty members participate in university-wide initiatives and the university's academic plan. Also describe how the program, as a unit, develops multidisciplinary relationships and leverages unique opportunities in the institution and the community.

Program Response:
In its role within City Tech and as a part of the senior college of technology of The City University of New York (CUNY), our department offers the most accessible architectural education in the metropolitan area, with competitive tuition and a large enrollment capacity. City Tech's Department of Architectural Technology is known for its workplace-oriented curriculum, leading edge technologies and student-focused environment, providing opportunities for students to engage in real-world community service projects. Our easily accessible location in Downtown Brooklyn makes the department uniquely situated to use New York City and its environs as a laboratory for learning and as an extension of the classroom.

All of our full-time tenure track professors are licensed professionals, and our part-time instructional pool of over sixty adjuncts hold prominent positions in city agencies, at prestigious public and not-for-profit institutions, and with the region's leading private architecture, design and engineering firms. Our faculty are increasingly recognized regionally and nationally for their important contributions to the profession. The department has been awarded significant grants that have provided new resources and interdisciplinary research opportunities for our faculty and students. The student experience is enriched through participation in programs such as Emerging Scholars, which provides students the opportunity to conduct advanced study and research alongside faculty mentors. Faculty and students have presented research at professional conferences receiving awards from organizations such as ACSA (Association of Collegiate Schools of Architecture), SARA (Society of American Registered Architects), and the AIA (American Institute of Architects).

New York City College of Technology's Department of Architectural Technology is committed to building strong partnerships with industry professionals. Our core curriculum and electives are focused on key areas of industry as identified by our faculty and Advisory Board. These include: Building Information Modeling (BIM); Environmentally Sustainable Technologies; Advanced Computation and Fabrication; Preservation, Restoration and Existing Building Tools and Technologies; Zoning Regulations; Building Code and Approvals; Acoustics and Lighting; Advanced Construction Detailing. Faculty with special expertise in these fields lead these courses. Our proximity and ease of access to all of New York City, coupled with nearly fifty years of faculty-cultivated relationships with employers, practicing former graduates, and other career professionals allows us to identify potential jobs and other unique learning opportunities for our students.

Starting in 2022, the department forged a strong relationship with the Brooklyn AIA chapter on several collaborative initiatives, including a public discussion series hosted at the college and organizing the department's first fundraising event Building Blocks, and our department was featured in the fall 2022 Brooklyn AIA publication Pylon. The Brooklyn AIA leadership has promoted the department to its membership as a source of interns and employees, and conversely a resource the department can call on to solicit instructional staff. Our students are motivated to participate and be leaders in the college's many student-initiated clubs. The Architecture Club, AIAS, NOMA and Study Abroad Program have facilitated students' travel and study at destinations around the world. As active members of professional organizations our students have won design competition awards from the AIA Student Chapter (AIAS) and the Society of American Registered Architects (SARA). In 2015, Professors Aptekar and King, led our students in the Solar Decathlon "Build Challenge:, an international competition sponsored by the U.S. Department of Energy, finishing fifth in engineering and seventh in architecture. Starting in 2021, Professor Aptekar has continued to lead students in the" Design Challenge" category of the competition, as an independent research project facilitated by the colleges Emerging Scholars program where students conduct independent

research and are awarded a $500 stipend. In 2021 they reached the finals and as of the Fall of 2024 over 35 students have taken advantage of this opportunity.

The faculty of New York City College of Technology are unique in many ways. Many maintain active practices and belong to a range of professional societies and certifying organizations such as USGBC, EDRA, NOMA, 2030 District, the AIA, ASCE and SARA. Our faculty have played key roles in professional development and leadership of the architecture profession in addition to providing community outreach and engagement.

Professor Illya Azaroff, FAIA, has been elected to The American Institute of Architects' (AIA) Board of Directors, as 2025 President-elect/2026 President. He is recognized for his expertise in resilience and served on the AIA National Strategic Council (2016-18), AIA New York Board and AIA New York State board. He served as the YAF - Young Architects Forum Advocacy Director and co-founder of the AIA Design for Risk and Reconstruction committee at the AIA New York chapter. He serves on the Board for SHADE- Sustainable Humanitarian Architecture Design for the Earth and the Scientific Advisory Council for Oceanic Global. He advises the New York City Mayor's office of Climate Resilience (MOCR) and the Federal Government (HHS) on building the National Disaster Framework. He recently served as Chair of the National AIA Board Knowledge Committee and served as the 2021 AIANYS President. He has been appointed to the New York State Climate Impact Assessment by Governor Hochul and at the request of incoming New York City Mayor Adams worked on the administration's transition informing resilience, sustainability and infrastructure.

Prof. Paul C. King, AIA, ASCE has been a member of the executive board of the New York Council of the Society of American Registered Architects (SARA) since 2009 and served two consecutive two-year terms as president from 2012-2014. As a recognized historian with a specialty in the early works of John Roebling, he lectures often at various museums and provides consulting services to the National Parks Service at the site of Roebling's Delaware Aqueduct. In the fall of 2024, Professor King took over the leadership of the Brooklyn Waterfront Research Center as executive director. Institutionally affiliated with City Tech, the BWRC supports a 3-part mission that promotes Education, Research and Public Events that focus on the Brooklyn Waterfront.

Prof. Philip Anzalone AIA has served as a Member of the Board of Directors AIA New York State, as New York Regional Representative to the Young Architects Forum 2015-16 and was the Co-Chair of AIANY Professional Practice Committee 2022-23. Prof. Anzalone has also served on the Board of Directors of the Association of Computer Aided Design in Architecture (ACADIA) since 2018.

Prof. Shelley E Smith AIA, PhD. is recognized for her research on historic preservation and serves as the professional member of the Bedford Historic Building Preservation Commission and the Katonah Historic District Advisory Commission. Professor Smith also serves as a Co-Director of the campus wide Faculty Commons.

Prof. Jill Bourtagalou, RA serves on the Board of Brooklyn Autism Center and like many of the faculty maintains a professional practice and consultancy.

Prof. Esteban Beita, AIA, PhD. is known for his research on traditional and contemporary Japanese architecture and immersive technologies, including photorealistic 3d and virtual reality experiences. He has been invited on multiple occasions to be part of a panel of architects discussing urban spaces in Asian cities at the Center for Architecture in NYC. While serving as coordinator of the Urban Design course, Prof. Beita coordinated collaborations with several NYC communities, including the Chinatown Partnership, Downtown Brooklyn Partnership, Industry City Brooklyn and Brownsville Brooklyn, exposing students to working and collaborating within their own communities. Prof. Beita also serves as the department's exhibition coordinator, resulting in multiple student exhibitions on campus, at the Brooklyn Courthouse, Chinatown and Industry City.

Prof. Ken Conzelmann, AIA, FARA serves as the NCARB academic licensing advisor at the department. He served as co-instructor with the AIA/NY Learning by Design/Architects in Schools program for NYC public schools as well as the ACE Mentor Program that helps prepare high school students for careers in design and construction. He is part of a roundtable for Professional Practice Professors in New York City and from 2009-2019 served as a board director and co-chair for Special Design Awards committee with SARA|NY.

Prof. Lia Dikigoropoulou, has served as a director of the NY Council of SARA since 2013.

Prof. Claudia Hernandez is the department's acting liaison with the New York Architecture League Mentorship program, the City Tech Peer mentorship program and supports various student organizations.

Prof. Michael Duddy serves on the Executive Committee of the Board of Directors for the Yale University Alumni Fund, is the Co-chair of Yale School of Architecture Alumni Fund (2016-current), a Delegate of Yale Alumni Association for the School of Architecture (2011-2015), and is co-chair of the Reunion Committee, YSoA Classes '80-'85. He is the recipient of the 2021 Chair's Award for his service on the Yale Alumni Fund. He is serving the college as a faculty director for the First Year Learning Communities Project which is a successful interdisciplinary effort to enhance student experience and encourage lifelong learning in the first year of college.

Several faculty members have worked with the 2030 District, a public-private partnership advocating for climate action, that is being set up in New York. They provide expertise on various technical matters, such as Prof. Jihun Kim, PhD., with his expertise in energy modeling and environmental design. Professors Alexander Aptekar and Paul King, along with a broad spectrum of faculty, led the school's 2015 Solar Decathlon Team DURA entry and continue to engage in advancing sustainability through prototyping.

The demonstrated outreach, partnerships and valuable leadership to professional societies by the City Tech faculty sets a high standard for our students and continues to demonstrate exemplary leadership in service to the profession, community, and society.

The department is a growing center for academic and scholarly activity in cutting-edge design and technologies that impact the field. Prof. Smith was the project director of the National Science Foundation Fuse Lab project at the college, a four-year, $877,322 grant funded by the National Science Foundation's Advanced Technology Education program. The grant supported curriculum development, co-curricular support structures, faculty training and enrichment, and partnerships with industry experts focused on three key technology areas in today's construction industry: Building Information Modeling (BIM), building performance (green/sustainable technologies), and advanced computation and digital fabrication. The project was undertaken as part of a broad curriculum initiative in response to the accelerating roles of digital modeling, simulation, and prototyping in the AEC industry. These tools allow builders, engineers, and architects to collaborate more closely from the outset of project conception and design, through construction and post-occupancy. These industry developments have required a transformation in preparing students for the workplace. The Fuse Lab provided funding for a more rapid, rich, and effective transition of curriculum and access to resources than would otherwise have been possible. Prof. Smith has served as co-PI for several other grant projects at the college-funded by Title V and the National Endowment for the Humanities. In the Fall of 2021, Prof. Smith was also awarded a $3M USDOE Title V grant and is serving as the PI. This grant is focused on developing Hispanic Serving Institutions to expand education opportunities for and improve attainment of Hispanic Students.

Our faculty and students study issues related to development in Brooklyn and bring these to the public through exhibitions and symposia. Professional development workshops sponsored by our

department provide faculty, students, and local professionals with opportunities to develop new skills in software and tools to enhance their practice.

The Architectural Technology Department provides architectural history courses which form part of the College's general education curriculum, and which are available to students across all departments of the College. In addition, faculty of the Architectural Technology Department participate in several interdisciplinary courses in which they team up with a professor from another college department to co-teach a full semester class. Several members of our faculty, often teach the interdisciplinary course, "Learning Places", that brings together faculty from the Architectural Technology, Library, and Hospitality Management Departments, among others, to help students across the college develop placed-based learning skills that are rooted in primary source research, direct observation, and information literacy. Recently, Professor Anne Leonhardt, developed an interdisciplinary course in collaboration with the Communication Design and Computer System Technology departments titled ARCH2205ID: Information Design Theories ID. This interdisciplinary course explores how the information design process transforms data into meaning. Through hands-on collaborative projects that highlight approaches from Computer Science, Communication Design, and Architecture, students will investigate the history and theory behind effective information design while employing user-centered practices.

As mentioned elsewhere, First Year Learning Communities bring our faculty together with professors from Mathematics or English to bring first-semester students into the college experience with cross-disciplinary teaching. In support of the college's emphasis on general education and interdisciplinary learning, our department's faculty has played a leading role on campus in curriculum redesign and new course development. Five of our faculty were awarded fellowships through the college's Living Lab Grant, giving them "reassigned" time to focus on general education principles and teaching techniques through seminars and projects.

From 2013-2015 we compiled a ten-year self-study of our department, a process that allowed us to reflect on our development and identify next steps for our programs. As part of this ten-year review, we invited an external reviewer, Wayne Drummond FAIA, Dean Emeritus, and Professor at the University of Nebraska-Lincoln, to visit our program and provide recommendations for future development. Dean Drummond visited in the Spring of 2015 and noted that the quality of student work, the strength of the faculty, and success of our building technology sequence had a strong correlation to that of B. Arch. programs around the country. His clear recommendation to our department was to formally pursue NAAB accreditation.

Enrollment and graduation data illustrate that an increasing number of students are seeking our four-year B.Tech. degree, demonstrating the demand for higher levels of education in preparation for the current workforce. In 2010, 31% of our graduates earned the AAS, whereas in 2015 only 20% of our graduates earned the same degree. In this time frame, the number of students earning the B. Tech degree increased 60%, rising from 71 graduates in 2010 to 114 graduates in 2015. Our projections for the B. ARCH 2025 graduating class are to almost double from 15 students to 26 graduates. We are compiling data to identify where our graduates go after earning their degrees, but initial findings indicate a significant increase in interest and applications to graduate schools, where students can earn an accredited professional degree. In addition, we see an increasing number of students placed in prominent NYC design firms including SHoP, ARO, Selldorf Architects, SOM, KPF, Perkins Eastman, and BuroHappold, as well as city institutions such as the NYC Department of Design and Construction, NYC School Construction Authority and the NYC Department of Buildings; demonstrating their importance to the New York City marketplace.

Our new accredited five-year B. Arch degree provides a significantly under-served student population with a pathway to an accredited professional degree that builds on our department's technologically enriched pedagogy at a highly competitive tuition rate.

To fulfill our mission to provide a high-quality architectural education to an underserved urban population, the college collects “Tech Fee” funds from each registered student and administers these to directly benefit our students. This is a major source of funding which supports the regular updates of hardware, software and other technologies in our classrooms. In recognition of our commitment to institute an accredited professional degree program in architecture, the college intends to seek additional financial support for fifth-year B. Arch students.

The ways in which the program encourages students and faculty to learn both inside and outside the classroom through individual and collective opportunities (e.g., field trips, participation in professional societies and organizations, honor societies, and other program-specific or campus-wide and community-wide activities).

Program Response:

The college fosters and encourages students and faculty to learn both inside and outside the classroom through a multiplicity of individual and collective opportunities. Below is a list of current ongoing activities at the college that help support this initiative.

Professional Societies and Organizations

American Institute of Architecture (AIA)
AIA New York and Center for Architecture offer nearly 1200 programs each year. Nearly all programs are free for City Tech students to attend and many faculty encourage student participation as part of reinforcing course work.

American Institute of Architecture Students Chapter (AIAS)
In Fall 2022, the students established an AIAS chapter at City Tech. This effort continues to further connect students to a national network of fellow AIAS chapters, activities, and mentorship opportunities. The relationship of the AIAS to the broader architectural community brings exposure and access to the professional world and help the student build a robust network.

National Organization of Minority Architects Student Chapter (NOMAS)
In Fall 2022, Students established a NOMAS chapter to connect with a national network of fellow NOMAS chapters, activities, and mentorship opportunities. Student participation in this organization is important to our student population since the large majority belong to underrepresented minorities in the field of architecture. The organization fosters a healthy conversation about the contributions this sector of the population brings to the profession.

Architectural League of New York (ALNY)
In the Fall 2018 the Department of Architectural Technology forged a strong relationship with the ALNY. The Department Chair, Sanjive Vaidya, was elected to serve on the League’s Board of Directors enabling a direct connection for the department. The Architectural League currently provides free admission to their lectures and events for our students. More importantly, to enhance and promote student access to the local professional network, the ALNY developed and runs a mentorship program specifically tailored for our students. Students are partnered individually with architecture professionals who act as mentors and supplement and guide their academic and career intentions. The program provides students with a professional experience external to the department. Regular meetings of these groups of students build pride in the unique access afforded to City Tech students to over 25-30 well-known architectural practices throughout New York City. As of spring 2024, over 130 City Tech students have been connected with professionals as a result of this program.

Student Organizations

NYCCT Architecture Club
The architecture club is a student lead organization that has been active at the college since 1979. It provides City Tech students with educational events such as guest speakers, lecture, onsite tours, architectural firm visits, and fieldtrips both local and abroad.

Architecture Club – New York City College of Technology (cuny.edu)

TECHNE
TECHNE the department's publication and exhibition, showcases both student work and faculty research. Its publication is led by a group of student volunteers and faculty advisors. The students oversee the overall production of the publication and exhibition; with guidance in 2023 from Professors Jieun Yang and Elena M'Bouroukounda. They are charged with conducting interviews, announcing calls for participation, content selection, material collecting, editing and the design and production of the publication itself. In Fall 2024 the exhibition was widely attended by students, faculty, and alumni fostering a sense of community between current and past students.
NYCTT_Techne Publisher Publications - Issuu

Emerging Scholars Program
The Emerging Scholars Program at City Tech provides a platform for students to present their contributions to research. Students work with a faculty advisor to advance their scholarly endeavors. The program includes specially designed workshops for students offered by the Undergraduate Research Committee, that assists in the preparation of an abstract and participation in the Honors/Emerging Scholars poster session. The Emerging Scholars Program provides a $500 stipend for full-time students (enrolled for 12 or more credits) and a $250 stipend for part-time students (enrolled in 11 or fewer credits) for conducting research with a faculty member.

ECOFEST
The campus offers several opportunities for broader student engagement. An annual sustainability conference, ECOFEST, held on Earth Day every Spring, highlights student work and efforts across the campus. This initiative, chaired by Felix Baez, a former Architectural Technology student and department SCLT, was begun by Sustainable CUNY, the sustainability initiative of the City University of New York, which aims to promote and implement environmentally responsible practices across its campuses. The campus Sustainability Committee includes students and faculty members from multiple departments. This conference brings in speakers worldwide, highlighting relevant work in the field and connecting students to their current and future roles in environmental stewardship and sustainability.

Mentorship/Pre-Internship Programs

Pre-Internship Programs
Over the past three years the college has developed a series of partnerships with local firms to provide the students opportunities to better prepare for internships and employment. The structure of these programs requires the students to attend a series of seminars hosted by architectural firms throughout the semester. At the end of the semester students may apply for an internship position. Dedicated pre-internship programs have been created with the following firms and continues enroll additional organizations as the program gains recognition.

• Tod Williams Billie Tsien Architects • Selldorf Architects • Diller Scofidio + Renfro • Perkins & Will Architects • HOK	• AECOM • ARO • BBB • BKSK • Gensler • Henning Larsen	• SOM • Rand • MBB • Snarkitecture

• FX Collaborative • Robert AM Stern Architects • COOK FOX	• Morris Adjmi • Studios • WPM	

Perkins Peer Advisement Program
The Perkins Peer Advisement Program has been active for the past eight years. This initiative focusses on giving exemplary upper-level students a platform to contribute to the department and grow their leadership skills by becoming mentors themselves. Through the grant, students are hired as teacher assistants and work with students and faculty in first year studio courses.

Summary Statement of 1 – Context and Mission

This paragraph will be included in the VTR; limit to maximum 250 words.

Program Response:

…*we aspire to produce graduates who become leaders* …

Our students are trailblazers, often the first in their families to attend college, navigating the complexities of academic life without traditional support systems. Straddling two worlds—one in New York, the other in countries of origin—they turn to architecture as a means to uplift their communities. Driven by grit, resilience, and a deep desire to contribute to their family's and personal legacies, they seek a future shaped by purpose and impact. Despite the challenges of a commuter school environment, our students cultivate a sense of belonging through collaboration, mentorship, and immersive extra-curricular engagement. They understand the transformative power of our global community.

Our faculty is equally committed, seeing education as a partnership that extends beyond the classroom. They dedicate themselves to mentoring students, helping them unlock their full potential and guiding them toward success. The challenges of stewarding a public institution are eased by witnessing our students develop the confidence and skills to excel.

Our department's mission embodies the university's commitment to socio-economic mobility. Our program is dedicated to empowering students with the tools, insight and network to build meaningful and fruitful careers. We prepare them to thrive by taking on challenges as opportunities. Furthermore, the city itself becomes a classroom, exposing students to diverse urban landscapes and the possibilities of the built environment. With access to a vast network of practicing professionals, adjunct faculty, and strong ties to public agencies and prestigious firms, we offer pathways to impactful careers. Our program is dedicated to empowering students to design with cultural awareness and urban insight, driving positive, inclusive transformation within both the architectural field and New York City.

2—Shared Values of the Discipline and Profession

The program must report on how it responds to the following values, all of which affect the education and development of architects. The response to each value must also identify how the program will continue to address these values as part of its long-range planning. These values are foundational, not exhaustive.

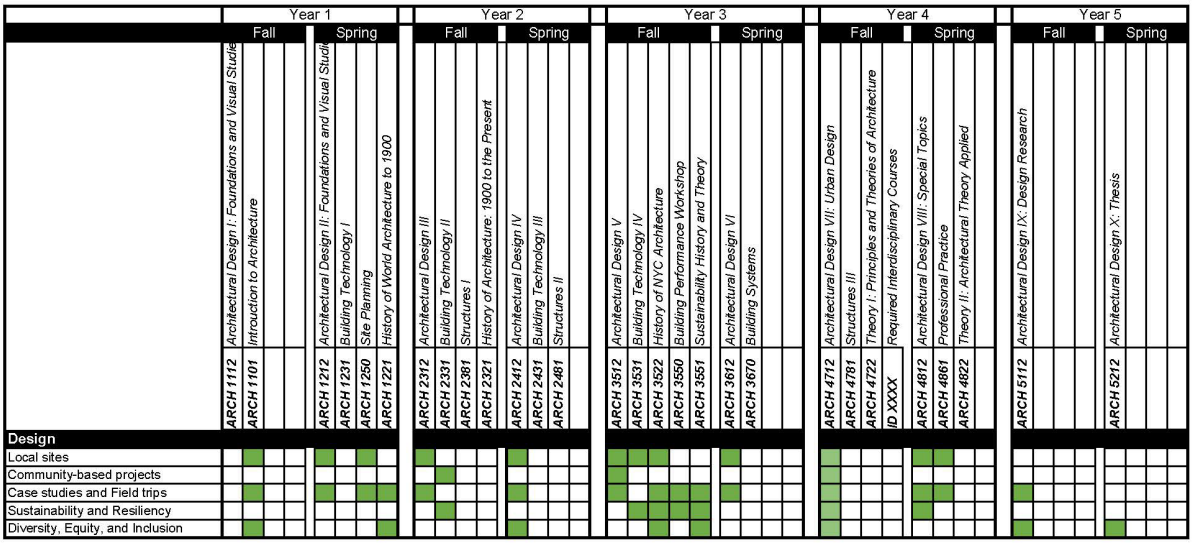
Design: Architects design better, safer, more equitable, resilient, and sustainable built environments. Design thinking and integrated design solutions are hallmarks of architecture education, the discipline, and the profession.

Program Response:

Design that engages building technology, sustainability, and local communities in urban environments is our curriculum's core. Our studio sequence teaches fundamental design

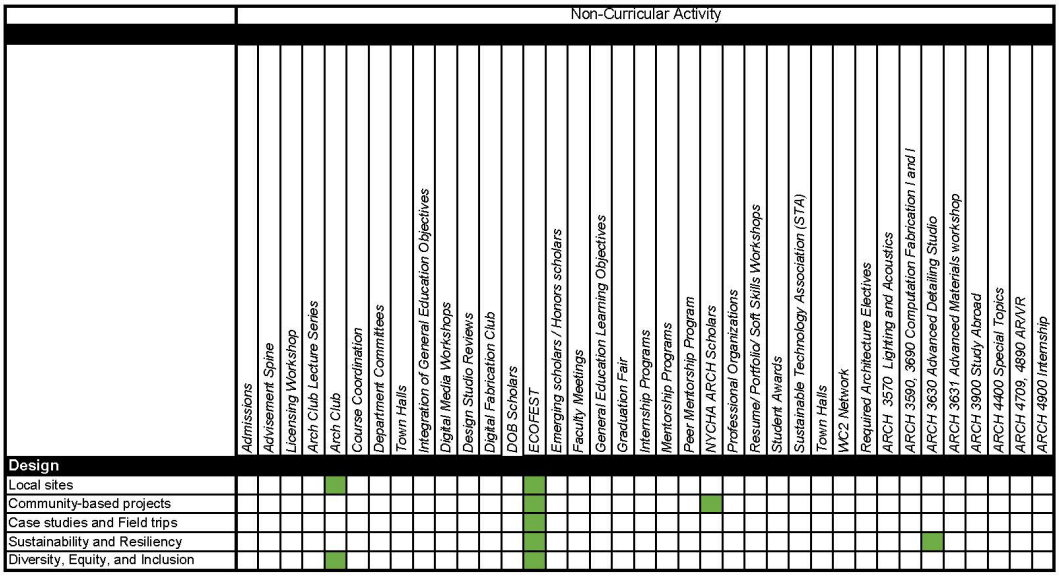
principles by studying various building typologies through projects that increase in complexity and scale and address current urban issues. Students are simultaneously exposed to both the conceptual art of architecture and the science of building by taking foundational design studios in tandem with building technology studios. Studio projects in both courses use New York City as a lab for learning and envisioning the future. Listed below are opportunities typical of our design sequence.

Opportunities in the Curriculum- Fall 2023 & Spring 2024



	Year 1								Year 2								Year 3								Year 4								Year 5							
	Fall				Spring				Fall				Spring				Fall				Spring				Fall				Spring				Fall				Spring			
	ARCH 1112	ARCH 1101			ARCH 1212	ARCH 1231	ARCH 1250	ARCH 1221	ARCH 2312	ARCH 2331	ARCH 2381	ARCH 2321	ARCH 2412	ARCH 2431	ARCH 2481		ARCH 3512	ARCH 3531	ARCH 3522	ARCH 3550	ARCH 3551	ARCH 3612	ARCH 3670		ARCH 4712	ARCH 4781	ARCH 4722	ID XXXX	ARCH 4812	ARCH 4861	ARCH 4822		ARCH 5112				ARCH 5212			
Design																																								
Local sites		■			■		■		■				■				■	■	■			■			■				■	■											
Community-based projects									■	■							■								■				■	■											
Case studies and Field trips		■			■		■	■	■				■				■		■	■	■	■			■				■	■			■								
Sustainability and Resiliency										■								■	■	■	■				■				■												
Diversity, Equity, and Inclusion		■						■					■						■		■				■								■				■				

Non-Curricular Opportunities- Fall 2023 & Spring 2024



	Non-Curricular Activity																																								
	Admissions	Advisement Spine	Licensing Workshop	Arch Club Lecture Series	Arch Club	Course Coordination	Department Committees	Town Halls	Integration of General Education Objectives	Digital Media Workshops	Design Studio Reviews	Digital Fabrication Club	DOB Scholars	ECOFEST	Emerging scholars / Honors scholars	Faculty Meetings	General Education Learning Objectives	Graduation Fair	Internship Programs	Mentorship Programs	Peer Mentorship Program	NYCHA ARCH Scholars	Professional Organizations	Resume/ Portfolio/ Soft Skills Workshops	Student Awards	Sustainable Technology Association (STA)	Town Halls	WC2 Network	Required Architecture Electives	ARCH 3570 Lighting and Acoustics	ARCH 3590, 3690 Computation Fabrication I and I	ARCH 3630 Advanced Detailing Studio	ARCH 3631 Advanced Materials workshop	ARCH 3900 Study Abroad	ARCH 4400 Special Topics	ARCH 4709, 4890 AR/VR	ARCH 4900 Internship
Design																																								
Local sites					■																																			
Community-based projects														■								■																		
Case studies and Field trips														■																										
Sustainability and Resiliency														■																		■								
Diversity, Equity, and Inclusion					■									■																										

Descriptions of Opportunities:

- **Ability to analyze and respond to urban conditions**
  Taking advantage of the rich environment of New York City, studio courses use local sites, which allow our students to make extensive site visits. Studios encourage research that reinforces and develops a working knowledge of New York City building, zoning, and fire codes.

- **Project Site**: Each design studio's project site in New York City allows students to observe and experience many different types of urban conditions. Design studio coordinators meet regularly throughout the semester to ensure that the overall curriculum covers a variety of urban conditions that inform project sites, with increased complexity through the sequence. For the thesis studios (Design IX and X), students can select the project site's location and size beyond the boundary of New York City. Design II is experimenting with a non-urban site module to widen students' exposure to landscape, changing ground plane, and other non-urban site conditions.
- **Site Analysis**: Site Analysis is a required component in all design studios. Class site visits with the professor help frame the conversation around analyzing the existing conditions of the project site and adjacent neighborhoods. As students progress through the design sequence, they are asked to respond to project sites of increasing size and complexity with increased rigor, learned observation and analysis. The Design Curriculum Committee continues to coordinate the level of expectation and analysis through the sequence.

- **Engage with members of the local community**
  Community-based projects ask our students to engage with members of local community organizations. These high-impact learning opportunities provide hands-on experience dealing with clients and real issues affecting urban environments.

  - **College Now**: College Now Summer Architecture & Urban Design Immersion Program, led by Professor Jieun Yang, sustains a continued partnership with the Concourse House (transient home for mothers and children) and Design Advocates to participate in community-led workshops. Students participate in the ongoing design and fabrication projects at the Concourse House, including the Sound Pavilion, which is composed of objects, images, and texts of past and present residents and collaborators. The lessons learned from each workshop often influence the final projects on public reflection space, where students incorporate community outreach, historical information, and creating shared experiential moments.
  - **ARCscholars**: ARCscholars, led by Adjunct Professor Naomi Langer-Voss provides the opportunity for 3rd and 4th year students to mentor young NYCHA scholars and residents for a semester or year-long projects that document existing shared spaces on NYCHA campuses and develop design proposals. Teams design and present environmentally and socially engaged interventions at the public presentations hosted by FXCollaborative and at the City Tech's Emerging Scholars Program presentation. This program has gathered interest and support from local leaders as a model of academic engagement with the community.

- **Experience the built environment**
  Case studies and field trips to local architectural landmarks are typically a part of the research phase of design studios and occur outside of class time led by faculty or through independent initiatives by students. A second significant asset of our location in New York City, and because of our strong industry ties, are field trips to local architecture, engineering, construction firms, construction sites, and product vendor offices.

  - **Class Field trips**: Many courses, including ARCH 1101 (Introduction to

Architecture), ARCH 3522 (History of NYC Architecture), and design studios, have required site visits to study and experience historic and contemporary architecture. The design curriculum committee has worked to create a wide distribution of sites covering throughout the five boroughs, including a Bronx transit site for Design V and a Brooklyn floodplain site for Design III. Course coordinators and activity leaders continue to assess field trip locations during regularly scheduled meetings to ensure that a variety of building typologies, contexts, and locations are being visited and experienced by our students.

- **Extracurricular Field trips**: A growing number of our students participate in student groups (AIAS, Architecture Club, NOMAS) and mentorship programs. These opportunities provide exposure to noteworthy and architecturally significant buildings and the inner workings of architecture offices in New York City. The mentorship program leaders track the number of students participating in the program. We are working towards a more consistent way to document individual student experiences in the mentorship program, such as keeping track of lessons learned and places visited by a student as part of the program.
- **Case Studies**: Precedent case studies are required in most design studios. Students are exposed to various architectural projects, often including diverse architectural practices, contexts, and sites. Course coordinators have discussed the need for a master list of precedents shared between the studios to ensure we cover a variety of precedents and a diversity of architects.

- **Understand and integrate sustainable and resilient design principles**
  Design is essential in creating buildings with high performance in all aspects of energy use, livability, and resiliency. It can actively respond to the environmental impacts of climate change. To that end, we imbed sustainable and resilient design principles in our upper-level design studios and require students to take a corresponding lecture course that supplements this aspect of their studio work.

  - **Site Analysis**: Sustainability and resiliency are key elements in the site analysis portion of our design studios. Students are asked to analyze specific environmental conditions of project sites such as flood zones, solar patterns, wind, and noise. They are then required to integrate their observations and responses to the site conditions in their design solutions. The number of factors and the type of response increases in complexity through the design sequence. For example, Design III and IV sites are in flood zones, that pushes students to think about how to design and build with the future scenarios in mind. The understanding and integration of sustainable and resilient design principles are assessed by a rubric for relevant assignments. And we continue to coordinate the level of expectation and analysis through the design sequence.

- **Create diverse and equitable spaces**
  Students are encouraged to research and feature their cultural backgrounds, experiences, and perspectives and translate this understanding through design that responds to the need for diverse and equitable spaces for people of different backgrounds, resources, and abilities.
  - **Critical Awareness in Design Responses**: In ARCH 2412 (Architectural Design IV), students are required to research and select a culture as the subject of their museum design. Some choose their own cultural backgrounds, and others look for opportunities to think of culture beyond being solely defined by ethnicity to

embrace issues of gender, mixed-race cultures, social perceptions, and standards. We believe there is considerable potential in coordinating and documenting opportunities to integrate cultural experiences into other parts of the curriculum. Given our diverse student body, we know that opportunities exist throughout the program and we need to develop a methodology for documenting and coordinating these activities.

- **Social Engagement**: In non-curricular activities, such as the Architectural Club, students are encouraged, through social activities sponsored by the club, to share and present their unique and individual perspectives and backgrounds with their peers. AIAS participates in vents co-sponsored with another school to exchange ideas and broaden their experience by connecting with outside peers. The architectural club faculty and student leaders meet continuously to seek and create more opportunities for students to feel more comfortable and confident in sharing their backgrounds and ideas.
- **Study Abroad**: Summer 2023 and 2024 Study Abroad programs have partnered with institutions in Germany and Italy, creating an opportunity for students to travel, observe, and engage in hands-on collaboration with their colleagues. The program is a condenser for social and cultural exchange that offers students the opportunity to learn from others and become teachers and ambassadors to their colleagues.

The program intends to continually address the importance of design in its long-range planning by reviewing and assessing the outcomes of design courses and the overall design sequence through assessment and the continual review of the sequence by the Design Curriculum Committee. An essential aspect of our curriculum is the robust Building Technology spine. The design sequence will continually evolve to align itself with the students' knowledge from the building technology program and the professional field of architecture.

Environmental Stewardship and Professional Responsibility: Architects are responsible for the impact of their work on the natural world and on public health, safety, and welfare. As professionals and designers of the built environment, we embrace these responsibilities and act ethically to accomplish them.

Program Response:
As architects, we strive to protect the public's health, safety, and welfare, and we believe we need to design better buildings to accomplish this ethical charge. The department is committed to environmental stewardship as a professional and ethical responsibility. Many of our faculty members hold LEED and CPHC certifications to impart their knowledge to our students, including Prof. Illya Azaroff, an industry leader in sustainability and resiliency, who continues to engage in outreach work.

To advance our students in the AEC (Architecture, Engineering, and Construction) industry, City Tech instills in students a holistic understanding of the dynamic between built and natural environments, enabling future architects to mitigate the impacts of climate change responsibly by leveraging economies, advanced building performance, adaptation, and resilience principles in their work and advocacy activities.

Descriptions of Opportunities:

- **Industry Partnerships**
  A global need for skills and strategies to curb the effects of climate change is increasing. Fostering relationships with industry partners is crucial to exposing our students to current developments in the profession.

    - **Passive House Network**: Recent developments have yielded a partnership between City Tech and the (PHN) Passive House Network to further our commitment to environmental stewardship and to provide pathways for student certification opportunities. Passive House lesson planning has been integrated into our curriculum as modules across multiple courses, and student membership in the organization has been offered to interested students. ARCH 2331: Building Technology II incorporates passive house principles in exploring building details, R-value calculations, and the integration of a mechanical building section.
    - **ULI – Urban Land Institute**: Urban Land Institute has worked with us to incorporate Urban Plan into our design curriculum. Our urban setting and strong tilt toward sustainability influenced the new curriculum to further embrace the ideals of dense, sustainable living. The ULI Urban Plan curriculum now includes an Eco-district as part of the project process. ARCH 4712: Architectural Design VII has adopted ULI's curriculum as a learning module.

- **Curriculum Integration**
  Buildings of excellence go well beyond current standards and strive, through innovation, to create more sustainable, resilient communities, buildings, and livelihoods for the people and businesses that use them. Design is essential to developing buildings with high performance in energy use, livability, and resiliency and can actively respond to the long-term environmental impacts of climate change. In essence, buildings do not have to look different; they need to perform differently to address the challenges of our time. Throughout the curriculum, the students are introduced to methods and industry standards for addressing the pressing needs of the planet. Those elements are further integrated into courses and special topics studios, enabling practical application to student projects and reinforcing professional vocabulary needed in the marketplace.

    - **Required Courses**: ARCH 3550- Building Performance Workshop or ARCH 3551- Sustainability: History and Practice have been adopted by the faculty as required courses. The chancellor's report showing ARCH 3550- Building Performance Workshop or ARCH 3551- Sustainability: History and Practice as required for BArch students, effective Spring 2023, can be found here NYC_Tech_AURD_Jun_2022 (cuny.edu).
    - **ARCH 4812-Architectural Design VIII**: All sections of ARCH 4812- Architectural Design VIII adopted energy modeling as a critical component of the curriculum and tasked students with quantitatively assessing the environment of the design process.
    - **Sustainability Spine**- Professor Alexander Aptekar has been leading the development of a sustainability spine that will weave different aspects of sustainability throughout the curriculum.

- **Inspire active and engaged citizens**
  We aim to develop graduates who are prepared to be active, engaged citizens, understand what it means to be professional members of society, and act ethically on that understanding of environmental justice, equity in society, and sustainability in practice.

    - **ARCH 3551- Sustainability: History and Practice**: The final term paper required in ARCH 3551- Sustainability: History and Practice, requires students to discuss current problems in cities and society brought on by climate change and human-related activities through research. Students must posit solutions that address time scales, ecological interests, and social systems to be successful. As the culmination of semester-long coursework that embodies environmental stewardship, students must consider society through the lens of environmental justice, equity, and sustainability.
    - **Freedom by Design/ Green Space**: The Freedom by Design/ Green Space student organization has spearheaded efforts to create gardens on campus, engaging with the issues of resiliency and sustainability at an immediate, local level.

- **Apply a firm foundation of resilient and sustainable methods**
  We seek to demonstrate that students can develop research agendas and apply environmental conditions to design processes. We aim to enable students to gain a firm foundation of resilient and sustainable methods and apply them to coursework.

    - **Environmental Research**: The assessment of environmental research applied to design is evident in the course notebooks of the classes listed below. In each case, key research elements rely on environmental inputs and various scales of time. Sun, wind, water, sea level rise, extreme heat, shocks, and stresses that are natural and man-made are part of the key research parameters. At the same time, a deep understanding of human and physical geographies are additional research elements that play a crucial role in attaining the above department outcomes.
        - ARCH 4712- Architectural Design VII
        - ARCH 4812- Architectural Design VIII
        - ARCH 2331- Building Technology II
        - ARCH 3531- Building Technology IV

      Similar environmental analysis modules to those used in ARCH 4812- Architectural Design VIII are now being considered to expand and broaden this value into other design studios.
    - **Historical Precedents and Scientific Methods**: Further outcome assessment is planned with newly approved courses that embrace similar research trajectories, scientific methods, historical precedents, and emerging topics.
        - ARCH 3551- Sustainability: History and Practice
        - ARCH 3550- Building Performance Workshop

- **Foster and maintain an ethical sensitivity and approach to stewardship of the environment**
  In creating future architects, we seek to foster and maintain an ethical sensitivity and approach to the stewardship of the environment while building confidence and capacity in our students to tackle the problems of our world and the challenges facing society.

    - **Understanding complete parameters of place and people**: Understanding the soft and hard geographies, physical and social, enables students to understand

the complete parameters of a place. In addition, students gain a sense of who we are designing for and who we serve in our ethical charge for the public's health, safety, and welfare.

- SWOT (strengths, weaknesses, opportunities, and threats) analysis in ARCH 4712- Architectural Design VII and ARCH 4812- Architectural Design VII
- Health Safety and Welfare Assignment ARCH 4712- Architectural Design VII
- Demographic and neighborhood analysis ARCH 4712- Architectural Design VII and ARCH 4812- Architectural Design VII
  - Including future projections of climate impacts
  - Environmental concerns and impacts
- Precedent research in ARCH 4712- Architectural Design VII and ARCH 4812- Architectural Design VIII

- **Expand understanding through historical context**: Further ethical sensitivity to these subjects is assessed in the course ARCH 3551- Sustainability: History and Practice with a research assignment. The assignment requires in-depth research and examination of a city, technical building, movement related to the subject, or significant figure that has impacted the field. Outcomes are assessed by a rubric set forward in the course notebook.

Long-term planning for the Department of Architecture Technology includes expanding awareness, practice, and access to the essential tools our students need to achieve competency, positively impact ecological stewardship, and help curb the long-term effects of climate change. Building a resilient, sustainable, and equitable future for our communities starts with future architects and design professionals we are shaping at City Tech.

Equity, Diversity, and Inclusion: Architects commit to equity and inclusion in the environments we design, the policies we adopt, the words we speak, the actions we take, and the respectful learning, teaching, and working environments we create. Architects seek fairness, diversity, and social justice in the profession and in society and support a range of pathways for students seeking access to an architecture education.

Program Response:

City Tech offers a diverse, multicultural learning environment. Diversity, equity, and inclusion are central assets of our program and our culture at City Tech. Students and faculty come from over 138 countries and speak over 85 languages. Venerable characteristics of the department are its demographic composition, comparatively low tuition, and respectful learning environment, which creates a wealth of students eager and motivated to enter and engage in the profession. Including them in the discourse and practice of architecture in New York City can positively impact the well-documented imbalance of representation in the profession. Please refer to Section 5.1 for the demographic composition of our department.

The department further recognizes the value of our student's varied backgrounds, experiences, and stories. We measure the results of our efforts by verifying student participation and surveying their ‘pre’ and ‘post’ experiences (see PC1). Collecting this information, we can see progress in providing opportunities for students to expand their skill sets, increase exposure to the profession, and become more competitive in the marketplace. Utilizing mentorship and pre-internship programs, we are making substantive progress toward increasing fairness, social justice, and equity in architecture education.

Descriptions of opportunities

- **Explore diverse perspectives**
  We actively engage in the topic of advocacy and response to current social, cultural, environmental, and economic issues. Students are encouraged to research and present their cultural backgrounds, experiences, and perspectives and to translate that understanding into the design of unique built environments that equitably support and include people of different backgrounds, resources, and abilities.

    - **Place for Advocacy**: ARCH 2312 – Architectural Design III's semester-long project focuses on the topic of "Place for Advocacy," where each student is encouraged to research a current topic they feel passionate about and respond with design solutions that support the ideas of the topic and create spaces for public discussion.
    - **Museum of Culture**: ARCH 2412 – Architectural Design IV 's semester-long project "Museum of Culture" allows students to define their understanding of cultures that go beyond topics of ethnicity, learn the historical context of museums, and explore new ideas for the future museums as a forum to engage in equitable cultural exchange.
    - **History/ Theory Courses**: The department has continued to work to include a wide range of buildings and historical context in its history/ theory courses. A respectful learning and teaching environment is created by highlighting a range of student cultures and drawing direct connections to their current studies. While the history of autochthonous architectural forms in Europe, the Far East, South Asia, Africa, pre-Columbian Latin America, and the Islamic World is covered, special focus is directed to the cross-cultural exchange of architectural forms through the migration of peoples and the spread of global religions and trans-continental migration and colonization in the early modern period. In this way, the course provides a comprehensive overview of the richness and diversity of architecture as a dynamic cultural artifact informed by the ever-changing construction and understanding of history. Small class sizes allow faculty to utilize multi-modal teaching techniques in their classroom. It is common for faculty to take students on a spontaneous tour of a nearby building or arrange a guest lecturer to present a unique perspective to the students. The students' cultural backgrounds help them be respectful and mindful of their colleagues' rituals, practices, and opinions. Faculty advocacy and encouragement of diversity reinforce a positive and respectful environment.
    - **Interdisciplinary Courses:** Students are required to take an ID course which enables students to consider multiple perspectives on a subject taught by faculty from two different academic departments.
    - **Collaboration with the community**: The department continues active partnerships with community organizations in our curriculum, as seen in the example of a community-led workshop at Concourse House (in collaboration with Design Advocates) for College Now Summer Architecture and Urban Immersion Program and empowering NYCHA residents through design charrettes led by student mentors in ARCscholars program.
    - **Study Abroad Program**: Summer 2023 and 2024 programs to Germany and Italy have been successful, where students collaborated with partnering organizations and peers from other countries.

- **Foster Student Voices**
  We encourage the development of our students' voices academically, professionally, and socially so that they can act for social justice in our urban community and create space for expression and exploration.

- **Alumni Network**: Building an alumni network is instrumental to providing current students insight into the professional working environment after graduation. Alumni participating in town halls and licensing seminars reinforce lessons learned in the classroom and support current students regarding licensing and practice. The alumni network is managed by department faculty, which provides direct access to academic programs and internships.
- **Student Clubs**: The student clubs have become a robust part of student life with ongoing guest lecture series, interfacing with other schools, and office visits. With the guidance of faculty advisors, three main student groups – Architecture Club, NOMAs, and AIAS – work together to plan internal and external activities. Architecture Club's speaker series helps expose to a wide range of topics facing the profession. AIAS has forged relationships with other nearby chapter schools to create a forum to gather and share their ongoing projects through Pecha Kucha events.
- **Student Publication and Gallery Show**: TECHNE has transformed into a student-led annual publication that showcases exemplary student works, accompanied by an opening gallery event. Under the guidance of faculty advisors, students review archival materials, design layouts and installations, and plan the logistics of the day of activities.
- **Brooklyn AIA Discussion Series**- With the support and guidance of the Brooklyn AIA chapter, students initiate and select the topics of discussion and participate in selecting speakers. Events are attended by both students and professionals who earn continuing education credits, providing a forum for extended interaction and discussions.
- **Departmental Roles for active students and alumni** : The department solicits students with demonstrable skills and interest in to take on roles as tutors, workshop providers and lab managers. Several alumni have returned to take positions as adjunct faculty members. This loop is a manifestation of pride for long time faculty and graduates.

- **External Engagement**

  We engage diverse external industry representatives and community stakeholders to forge relationships to support our students in and out of the classrooms. From firsthand sources, students are exposed to current discussions about regional and internation design issues and practices.

  - **Architectural League Mentorship Program**: The Architectural League mentorship program, which matches students with designers and architects, promotes conversations about quality of life and tools to balance work and school. Mentors come to support their mentees directly in the department during project reviews. The program has tripled since it began and now includes the Spitzer School of Architecture at City College of New York (CCNY), and the Michael Graves College of Architecture & Design at Kean University. The mentor matches at the department have averaged 25-30 per a year. The matches are based on student and mentor participation questionnaires and include personal background information and spoken languages.
  - **Fall 2022 Fundraiser**: With the support of the AIA Brooklyn Chapter, the school hosted the first fundraiser event in Fall 2022, including a keynote address by Katie Swenson of MASS Design Group. The event was an opportunity to open the door to guests, including industry representatives, community stakeholders, friends and family, and an alumni network. The steering committee, including alumni, students, and faculty, was instrumental in the planning and organization of the event. The students and alumni docents provided tours of the students' work gallery and discussed their experiences.

- **Panel Discussion Series**: In partnership with the AIA Brooklyn Chapter, City Tech started hosting and participating in planning the discussion series in 2022-2023. The series presents designers and stakeholders in a conversation about large ideas and local responses rather than a long-form lecture. Encouraging questions and discussion is an integral part of this effort. KPF supported its inaugural year. A core group of students participate in the development and logistics of the program, and many students attend the program and participate in the discussions.

- **Exposure to Diverse Career Paths**
  We utilize mentorship programs, structured internships, and other forms of external engagement to inform students of many options for their future careers and current studies to support their path.

  - **Business Minor**: The department continues to encourage students to gain financial literacy by participating in the Business Minor degree offered at the college. We believe financial literacy empowers students to take control of their current situation and offers a larger goal to support students who may pursue their own practices and businesses in the future. The number of students pursuing Business Minor degree has grown steadily since Fall 2021 when the Minor was introduced.
  - **Multiple career pathways**: Providing specialized technical courses, the department enables students to consider various career pathways into the profession. Digital fabrication, digital visualization, and preservation technology courses are recommended based on a student's interests and academic strengths. Updating with the changing times, BIM has become a requirement integrated into the Building Technology sequence.
  - **Pre-internship Programs**: Outside the classroom, the pre-internship program offers a window into the inner workings of NYC-based architectural offices. The students attend workshops that foster an understanding of the profession through field trips, portfolio workshops, and exposure to ongoing projects.
  - **Scholarships and grants**: In addition to creating infrastructure to share external scholarships and opportunities, the department has been steadily working to increase the number and magnitude of scholarship and grant partnerships to alleviate the students' financial hardship further and offer students a chance to connect with the profession to expand their employment choices after graduation. The department has ongoing partnerships with Selldorf Architects and FX Collaborative, offering scholarships and summer internship positions to qualified City Tech students.

- **Scaffolding the Higher Education Pipeline**
  The department recognizes that equity requires an expansion of effective pre-college experiences for program applicants while maintaining connections with graduates. These pathways require continuous collaboration between academic and professional partners. These programs expose participating students from partner high schools and colleges to resources for discussions in design practice, historical context, and external influences impacting urban morphology.

  - **College Now Summer Architecture and Urban Design Immersion Program**: Finding opportunities through recently redeveloped ARCH 1101: Introduction to Architecture, the curriculum is now integrated into the annual summer College Now

Architecture and Urban Design Immersion program to offer a well-rounded exposure to how to observe, engage, and critically think about the built environment around them through cultural, social, economic, and historical influences. The program is free for NYC public high school students. It continues inter-disciplinary collaborations with other departments, such as the African American Studies Department, and community outreach workshops at the Concourse House through Design Advocates, a group of architects and designers collaborating to serve the public good. Field trips are an integral part of the curriculum, exposing students to sites of remembrance and public spaces. The final project integrates lessons learned through collaborative creative making and narrative process integrating multi-media.

- **Partnerships with Public Technical High Schools**: Memorandums of Understanding (MOU) were created with ten public Technical High Schools to ensure access to the department is secure and communication about the profession is maintained.
- **Articulation Agreement with Queensborough Community College**: The Department of Architecture has an articulation agreement with the Department of Engineering Technology at Queensborough Community College (QCC) to create a pathway for two-year associate degree students. These programs' demographic reinforces the department's diversity, ensuring students have informed and structured access to an affordable professional degree program. Program information sessions are circulated to these partner programs to provide clear information on application requirements and professional pathways. There are currently no transfer agreements in place with four-year colleges or graduate degree programs.
- **ARCscholars :** This program introduces architecture and design to NYCHA young adults through the study of a specific NYCHA (New York City Housing Authority) development. These students are mentored by City Tech Architecture students. Together the scholars investigate the existing conditions at the selected campus and collaboratively determine design improvements. The scholars meet with leaders within the NYCHA community and further mentored by architectural and urban design professionals. The students creatively integrate the words of the leadership, their peers, and their personal experiences into the designs. The program is supported by FXCollaborative and Dr. Sharon Egretta Sutton, FAIA Distinguished Visiting Professor of Architecture at the Parsons School of Design.

Knowledge and Innovation: Architects create and disseminate knowledge focused on design and the built environment in response to ever-changing conditions. New knowledge advances architecture as a cultural force, drives innovation, and prompts the continuous improvement of the discipline.

Program Response:

Advanced curricula in design studios, lab electives, and several extracurricular activities focus on research in sustainability, resiliency, performative design, high-performance building systems, and augmented and virtual reality (AR/VR). Students develop confidence in approaching research questions on significant current topics where technology meets architecture. The students work collaboratively to propose new ideas and environments that follow an analysis of information from multiple sources and respond to multiple parameters.

Broadening experiences that provide a global perspective and knowledge of the architectural profession and innovations in the field makeup part of the long-term planning for the Department of Architectural Technology. Outcomes focus on an infusion of research-based knowledge and research approaches as part of the student experience through the following opportunities.

Descriptions of opportunities

- **Coursework**
  - **Research-based architectural technology practitioners**: Courses including ARCH 4812- Design VIII, ARCH 3570- Lighting and Acoustics, ARCH 3550- Building Performance Workshop, and ARCH 3590, 3690, and 4791, the Computation and Fabrication sequence, involve long-term collaborations with professors affiliated with HOK Facades, Arup Acoustics, and the Brooklyn Navy Yard. These partnerships bring real-world knowledge and approaches to the classroom.
  - **Research library and database**: ARCH 3631- Advanced Materials Workshop uses an academic Material ConneXion library and database access to gain knowledge of this resource for innovative materials that material scientists curate. ARCH 4709 focuses on Virtual and Augmented Reality.

- **Research**
  - **Independent research opportunities**: The school maintains initiatives that complement the research-based curriculum offered to students, including such programs as the Emerging Scholars, Honors Scholars, and the Undergraduate Research Scholars, where students work in small groups directly with a professor on a research project that is shared in a juried college-wide public poster presentation near the end of each semester. Research topics take advantage of recent developments in software or hardware development and are often derived in collaboration with practitioners who work with advanced technologies.
  - **Research and innovation-driven thesis projects**: Students participate in a B. Arch Thesis through a two-semester long research project in ARCH 5112 and ARCH 5212, having the design studio sequence culminate in a research and innovation-driven thesis project based on student interests involving local practitioners and faculty expertise. The program intends to continually address the importance of knowledge and innovation in its long-range planning by reviewing and assessing the outcomes of student-individualized research through assessment and review by departmental faculty. An essential aspect of our curriculum is developing critical thinking that will allow the students to excel in graduate programs or the profession after graduation. The final thesis project of the B. Arch program will not only serve as a guide for the earlier students but to gauge the student's comprehensive understanding of knowledge and innovation skills through research and design.

- **Student Organizations**
  - **Sustainable Technology Association**: Clubs in the Department of Architectural Technology offer opportunities to explore architecture-related ideas with the multi-departmental Sustainable Technology Association. The Sustainable Technology Association explores ways to analyze, design, and manage ways to improve the environmental and ecological conditions in the world around us. Explorations of systems development have included embedded energy and materials, as well as Net Zero Energy buildings. The department is currently in the process of streamlining the fabrication lab to support student activities and curriculum.

- **Architecture Club lectures:** 25 - 50% of the weekly Architecture Club lectures host architects and engineers who address topics related to knowledge and innovation. We aim to increase attendance at the workshops to consistently have a minimum of 10 - 15 students by increasing student awareness of these opportunities.

- **Workshops**
  - **Digital Media Specialists**: Specialists in digital media provide workshops on 2D and 3D modeling, rendering, energy modeling, BIM, and GIS, as well as several special topics workshops that currently include Embodied Carbon Façade Design and Revit Parametric Integration. Access to the workshops, courses, and lectures is open to all students, including those not in the professional degree. Improved student outreach has increased the number of students attending these workshops but we are always looking for ways to continually increase participation.

Leadership, Collaboration, and Community Engagement: Architects practice design as a collaborative, inclusive, creative, and empathetic enterprise with other disciplines, the communities we serve, and the clients for whom we work.

Program Response:

At City Tech, we strive to instill in our students an understanding of the art of leadership, collaboration, and service; in essence, the ability to motivate people to act together to define and achieve common goals.

The ethical practice of architecture requires recognizing the impact of design, planning, and construction on the environment and community. Architectural education must endeavor to instill and build awareness and dedication to responsible practice for the public good. Our students are keenly aware of the social and economic challenges they and others face in their neighborhoods and communities. This awareness is a foundation for building an increasingly broad understanding and dedication to the responsibilities they will take on as professionals. Our design curriculum includes working with specific New York City communities to address critical urban challenges. Our program highly values community resilience and emphasizes it in multiple courses. Recent and current events impacting our urban community are used as points of departure in lectures, discussions, and assignments.

We foster the development of professional competencies (NACE career readiness competencies) by providing as many and as wide a variety of opportunities for students to understand and practice the collaborative, inclusive, and engaged leadership at the core of architectural practice.

We incorporate these learning goals by providing opportunities to:
- Develop leadership and collaboration competencies
- Understand professionalism and professional ethics
- Interrogate examples of culturally competent, inclusive, and equitable practices

Description of opportunities

- **Embedding learning lessons in the curriculum of the program**

  - **Collaborative Projects**: Across the curriculum, students participate in team-based projects that supplement their work. Collaboration involves merging individual ideas into unified concepts, disseminating workflows among team members, and managing time efficiently. All students in the program have

opportunities to develop leadership skills and to gain experience with collaborative team dynamics (see PC6 narrative and assessment).

- **Interdisciplinary Learning**: A signature of City Tech's general education curriculum is the requirement that all graduating bachelor degree students complete at least one Interdisciplinary (ID) course. Defined as a course that focuses on questions, problems, and topics too complex or too broad for a single discipline or field to encompass adequately, such studies thrive on drawing connections between seemingly exclusive domains. These courses are typically team-taught by faculty or outside lecturers from different disciplines. While students may choose from a wide variety of Interdisciplinary Courses, the Architectural Technology faculty have developed and taught courses encouraging our students to study issues from multiple points of view. The ID course ARCH/LIB2205ID Learning Places pairs the study of Urban Spaces in NYC with library research techniques. It offers architecture students an opportunity to work collaboratively in multidisciplinary teams with students across the college to research the complex and dynamic social and physical issues facing New York City, including social injustice, power and politics driving development and planning, gentrification, and segregation, deteriorating public housing, and environmental degradation. The team research project offers students the opportunity to practice leadership roles in the planning and execution of the team project. ARCH2205ID: Information Design Theories ID. Is an interdisciplinary course that explores how the information design process transforms data into meaning. Through hands-on collaborative projects that highlight approaches from Computer Science, Communication Design, and Architecture, students investigate the history and theory behind effective information design while employing user-centered practices.

- **Partnering with the Community**: Place-based learning is fundamental to the college's general education pedagogy. Advanced studios and electives extend place-based learning beyond field trips and site visits to the actual engagement of community stakeholders in the institutions and agencies that serve the community. The seventh-semester urban design studio has worked with community liaisons (Chinatown Partnership, Brooklyn Tech Triangle, NYCHA - New York City Housing Authority and Industry City) to guide students' project work for several years. Community stakeholders have facilitated team projects as "clients," providing a real-world experience as students develop programs and design projects that fulfill their "clients" needs. These experiences ask students to listen, understand their client's needs, work towards consensus, and communicate their solutions graphically and orally in a community-based forum.
- **Urban Land Institute UrbanPlan**: "UrbanPlan aims to develop land use professionals—developers, planners, architects, investors, and policymakers—who are more sophisticated and effective when they enter the workforce. Urban Plan moves students from a theoretical and ideological understanding of their discipline to the practical realities and demands of the development team and process. In addition, the module is a challenging team-building exercise and introduction to ULI and key leaders in the industry." This module was included in all ARCH 4712 Urban Design sections beginning in Fall 2022, and additional faculty are trained in the new curriculum (see PC6 narrative and assessment and ARCH 4712 Urban Design Course Notebook).

- **Creating opportunities for leadership participation in college-based organizations**
  - **Architecture Club**: The Architecture Club has been integral to the Department since its inception. Providing leadership opportunities, this faculty-guided, student-led organization sponsors guest speakers, holds fundraisers, and provides student activities to promote a greater appreciation for the field of architecture. The club

sponsors international travel to significant architectural works abroad and local travel that uses New York City and its environs as an extension of the classroom (see Architecture Club website).

- **Study Abroad Program**: Since 2014, the program periodically offers students opportunities to travel abroad with architecture faculty to study environmental concerns and participate in community-based service projects (see ARCH 3900 Study Abroad Course Notebook).
- **TECHNE**: An annual publication presenting student and faculty work across the architecture curriculum. In 2023-2024, TECHNE was re-imagined as a student-led publication, and a group of student leaders enthusiastically made final work selections and assembled the publication and an accompanying exhibition. Under faculty guidance, the student editorial team chooses, edits, and formats the selected work (see past issues of TECHNE).
- **Peer Mentor Program**: The Perkins Peer Mentoring program provides an opportunity for mid- and upper-level architecture students to acquire training and experience in leadership roles as peer mentors embedded in the first-year studios. There are various peer mentor programs across campus, and the college has begun an initiative to bring peer mentors and program coordinators together regularly for training and networking to raise the profile of these important leadership and service roles.
- **Professional Organizations**: Students and faculty participate in a range of activities sponsored by the American Institute of Architects (AIA), the Society of American Registered Architects (SARA), the Architectural League of NY (ALNY), and the Steel Institute of New York. Members of the full-time faculty have served as past presidents of local chapters of both the AIA and SARA and continue to serve as members of local executive councils, connecting students with opportunities for participation in organizations, conferences, and professional activities outside the university community.
- **Student Life & Development**: Opportunities beyond the Department include a wide variety of Clubs & Student Organizations, Student Government, and the National Society of Leadership & Success. The AIAS chapter won Freedom by Design funding and partnered with the Green Spaces Club to plan and implement several projects on campus during spring 2024.

- **Providing opportunities for students to learn about leadership, collaboration, and approaches to ethical practice from experience, observation, and professional mentoring**
  - **Internship Program**: Our internship program gives our students professional working experience while enrolled in our program and has provided a bridge to full-time employment. The elective internship class (ARCH 4900) fosters peer-to-peer leadership opportunities as students share reflections on their early professional experiences and support one another (see ARCH 4900 Internship in Architectural Technology). A list of internship opportunities and resources is maintained here: (https://openlab.citytech.cuny.edu/architecture-jobs/)
  - **Pre-Internship Program**: This unique and growing program provides a scaffold into professional life for students without access to professional mentors within their family and community circles. Students sign up for a series of talks with architectural firms, which is typically scheduled once per month over the semester. At the completion of the series, students submit resumes and portfolios for a competitive application for a summer internship with the firm. The program creates an effective intern selection process for the studios, establishes a dialogue between students and practitioners, and prepares interns for transition into full-time hires. The program has expanded the type of studios participating to address more student interests (fabrication, preservation, etc.), coordinated dates so more students can participate in multiple programs, and expanded the program to

include students earlier in the program, from the 2nd year and up. The program placed 137 students in 15 firms in 2023-2024.

- **The Architectural League of New York Mentorship Program**: The League Mentorship is an annual program organized in partnership with the New York City College of Technology (City Tech), the Spitzer School of Architecture at City College of New York (CCNY), and the Michael Graves College of Architecture & Design at Kean University. The League matches design professionals with architecture students for nine months of one-on-one advising, relationship building, and mutual learning. Over the course of the program, mentors meet regularly with their students, offering them guidance as they prepare for careers in architecture and design. The League organizes studio tours, panel discussions, and networking events to facilitate these connections. The mentor matches at the department have been consistent at 25-30 matches a year and included 27 matches in 2023-2024. The matches are based on student and mentor participation questionnaires and include personal background information and spoken languages.
- **Building Blocks Networking & Fundraising Event**: In December 2022, student teams participated, in collaboration with faculty and AIA Brooklyn partners, in the planning and hosting of this major Department event, which is envisioned as a biannual initiative. Student leaders served as docents and guides to guests from across the profession, gaining experience in event planning and professional networking. Approximately $60,000 dollars was raised at this one evening for the department's discretionary use. This reflects the confidence visitors had in the department's mission and in the students' potential.

We continue our longstanding commitment to embedding collaborative teamwork, real-world community projects, and interdisciplinary studies in the curriculum, and these activities are explicitly supported and embedded in college-wide programs and priorities. Likewise, co-curricular activities such as the student club and publication, professional organizations, peer mentor programs, and especially the pre-professional internship and mentorship programs remain robust and growing. In the near and longer term, we must focus on re-energizing those programs most dependent on face-to-face interactions and travel – study abroad restarted in the summer of 2022, and student clubs benefit from the expanding presence of students on campus.

Lifelong Learning: Architects value educational breadth and depth, including a thorough understanding of the discipline's body of knowledge, histories and theories, and architecture's role in cultural, social, environmental, economic, and built contexts. The practice of architecture demands lifelong learning, which is a shared responsibility between academic and practice settings.

Program Response:

Architects value educational breadth and depth, including a thorough understanding of the discipline's body of knowledge, histories and theories, and architecture's role in cultural, social, environmental, economic, and built contexts. The practice of architecture demands lifelong learning, which is a shared responsibility between academic and practice settings. To this end, the Department of Architectural Technology provides broad educational experiences, foundational skills, and integration of ideas and practical applications that foster lifelong learning.

Broad Educational Experiences:

A significant advantage our department leverages is its physical location in downtown Brooklyn and near lower Manhattan that serve as a dramatic backdrop for the context and challenges of an architect's cultural, social, environmental, and economic role. Walking tours and field trips

are an integral feature of the history, design and building technology courses. Discussions of building technology in-situ triggers a discussion of history and socio-cultural contexts which influence urban morphology. The range of cultures represented in the student body make connections to these narratives impactful.

As the faculty develop new curricula, electives, and specialty tracks, it increases engagement with institutional and industry representatives. The student-run Architecture Club, along with AIAS and NOMAS are instrumental to bringing practitioners, researchers, alumni, and scholars to the department, making direct and personal connections with those engaged in lifelong learning. This ensures that students experience an array of opinions and perspectives on the role of architects in an urban context.

Descriptions of opportunities

- **Local Field Trips:** Local sites are used in design studios to afford students the opportunity to make repeated and extensive site analyses and detailed inventories. History courses conduct walking tours of neighborhoods to view material technologies, like the cast iron district in Manhattan, or culturally relevant sites, like the African Burial Grounds in lower Manhattan or Greenwood Cemetery in Brooklyn.

- **Manufacturers & Fabricators**: The Brooklyn Navy Yard is an active hub for advanced manufacturing and fabrication with many companies which create construction building materials and designers that use digital fabrication tools to create sophisticated assemblies. Many of these shops welcome students from the department on guided tours to showcase their processes and products.

- **Museums & Galleries**: The city is unparalleled in its offerings of exhibits to students. Many cultural institutions allow for free admission to students. Some require a nominal fee for student groups. Faculty accompany students to galleries at the Guggenheim, MOMA, Metropolitan Museum, Skyscraper Museum, the Modulightor Building (formerly the location of Architect Paul Rudolph's design studio), the Center for Brooklyn History, and the Brooklyn Museum.

- **Broader Urbanism**: It is common for upper-level design studios to make detailed studies of the flow of people and resources through the densest areas of the city. They observe and take notes on devices which guide, funnel and limit movements. There are many accessible parks which provide contrast to these hardscapes, but of note are the Brooklyn Bridge Park, a work in progress, and the Highline. Both provide students opportunities to consider urban edges and boundaries with bodies of water being rehabilitated.

- **Foundational Skills**: The Association of American Colleges and Universities (AAC&U) provides a national standard for describing and assessing lifelong learning. This rubric includes the following sub-categories: curiosity, initiative, independence, transfer, and reflection.[1] The Department of Architectural Technology developed pedagogical strategies for all of these and integrated them throughout the curriculum. Lifelong learning foundational skills are most explicitly integrated into the early curriculum. Below are examples of how this is address in ARCH 1231- Building Technology I.

    - **Pedagogy/Learning Goal #1. Inquiry through Place-based Learning**: Making frequent use of New York City as a learning laboratory, the first building technology course (ARCH1231) utilizes inquiry through place-based learning, giving students

[1] AAC&U, "Foundations and Skills for Lifelong Learning VALUE Rubric," accessed June 15, 2022, https://www.aacu.org/initiatives/value-initiative/value-rubrics/value-rubrics-foundations-and-skills-for-lifelong-learning.

a foundation of learning to observe carefully, fostering curiosity, and analyzing building tectonics. It models self-directed and independent learning where the students can begin to pay attention to the built environment, they experience every day in a new way on their own, taking the initiative of making their day-to-day experience of the built environment a part of their life-long learning. This pedagogy leverages the opportunity for students to generate knowledge rather than be mere receivers of knowledge, something they appreciate in their reflections on the impact on their learning. The learning in the field is then intentionally transferred to the drawing exercises. This process, accessed and reinforced by metacognitive reflection, contributes to the foundation for lifelong learning in the program. Students regularly reflect on how these activities inspire them to look and observe differently in and out of the classroom. They also reflect on how they can transfer knowledge from the field into the classroom work. Other courses, including History of New York ARCH 3522 make similar use of inquiry through place-based learning.

- **Pedagogy/Learning Goal #2. Concept Mapping for Active Reading and Reflective Learning**: Concept mapping is introduced to students in their early courses, especially ARCH 1231 Building Technology I which is the first reading intensive course that deals with technical concepts. Concept mapping is a pedagogical approach that helps students identify, organize and visualize key concepts discussed in a class or a reading. This is a critical foundational skill that builds learning independence and metacognitive reflection on the learning process. This is especially important for text-based learning, which a key modality for lifelong learning in architectural history and theory.

- **Pedagogy/Learning Goal #3. Note-taking for Active Reading and Reflective Learning**: In a number of courses in the early curriculum, the pedagogy emphasizes the foundational skill of reading and note-taking. This learning is modeled and reinforced through seminars that include discussion of self-directed and independent learning. As part of the notetaking, concept mapping is applied to help students place the topics of discussion in context and see relationships between them. The student notetaking is tracked at a fine-grain level in the first course, holding students accountable for their engagement. Student reflections of this practice are used to monitor and access the learning goal. In their reflections, students give evidence of the positive impact on their learning and their metacognitive awareness of learning processes. Some students begin taking initiative and going beyond the base requirements of the weekly reading and note-taking. In addition, student reading effectiveness in the discipline is accessed through a pre and post semester reading exercise and writing response. Students regularly show improvement in their reading effectiveness. This pedagogy opens students to both text-based learning for self-directed, independent continuation of learning but also metacognitive awareness of the importance of engagement and curiosity with learning processes.

Students are regularly showing improvement in assessments seeking to measure foundational skills for lifelong learning. Faculty are encouraged to monitor and enhance their teaching practices and engagement with the students to model and foster the value of lifelong learning. Many architecture faculty participate in a general education seminar offered each academic year that provides a laboratory to share and test these practices and provide models, mentorship, and support from experienced faculty.

3—Program and Student Criteria

These criteria seek to evaluate the outcomes of architecture programs and student work within their unique institutional, regional, national, international, and professional contexts, while encouraging innovative approaches to architecture education and professional preparation.

3.1 Program Criteria (PC)

A program must demonstrate how its curriculum, structure, and other experiences address the following criteria.

PC.1 Career Paths—How the program ensures that students understand the paths to becoming licensed as an architect in the United States and the range of available career opportunities that utilize the discipline's skills and knowledge.

Program Response:

Throughout its history, the Department of Architectural Technology has been dedicated to developing the capacity of students to succeed in the workplace. As the nature of our profession changes, the department has moved from hand drafting to digital technologies and from simple to complex design projects. Increasingly, we have focused on the soft skills of analytical thinking and written and verbal communication. The department is a bridge between academia and the profession. To ensure that all students understand the paths to becoming licensed as an architect in the United States and the range of available career opportunities the program disseminates information to the student through a series of lectures and modules in required courses and advisement sessions. Below are descriptions of each activity and its assessment:

Activity Descriptions:

PROGRAM CRITERIA OBJECTIVE 01: To ensure that students understand the paths to becoming licensed as an architect in the United States the following activities are carried out:

1. **ARCH 4861_PROFESSIONAL PRACTICE**

   Professional Practice provides an overview of basic business practices found in an architectural office. Applying the principles, understanding the reasoning, and offering examples in everyday office situations. The course provides a comprehensive look at architectural practice, with emphasis on the management of firms and projects. The course is designed to help the student with an understanding of the everyday realities of practice and to help prepare for licensure. This is a required course typically taken during the fourth year of the program. Professional Practice provides students with a detailed overview on licensure through a vigorous lecture.

   Description of the assessment measures and benchmarks:
   - Assessment Measure: Professional Practice Final Grade
   - Benchmark: 80% of the students met most requirements (Grade C or higher)
   - Evidence: Course Instructional Materials and student Survey

2. **ADVISEMENT SPINE**

   A robust Advisement Spine consisting of three formal required advisement sessions has been developed to keep students informed and current about program and career options. All the information is distributed via Brightspace – our college's Web-based virtual learning and management system. Paths to licensure are specifically addressed during advisement session two. During the students' 4thsemester the second required advisement session is held in all ARCH 2412: Architectural Design IV courses. The B. Arch Program Director visits all sections. During this session information regarding

licensure paths, requirements, and guidelines is distributed and discussed.

Description of the assessment measures and benchmarks:

Survey documenting participation
- Assessment Measure: Percent participation
- Benchmark: 80% of eligible students attend the B ARCH| B TECH Advisement 02 session scheduled in the curriculum.
- Evidence: Advisement Module presentation materials + attendance log documented by survey participation

3. LICENSURE SURVEY

During the spring semester of their fourth year of study, B. Arch Students are required to participate in an information session where the dedicated NCARB Advisor/Liaison is introduced. This information session includes topics such as:

- Paths to licensure and requirements
- Creating an NCARB record

Description of the assessment measures and benchmarks:
- Assessment Measure: Percent Participation
- Benchmark: 80% of the students attended the session
- Evidence: Student Survey

PROGRAM CRITERIA OBJECTIVE 02: How the program ensures that students understand the range of available career opportunities the following activities are carried out:

1. **ADVISEMENT SPINE**

As mentioned in the previous section, a robust Advisement Spine has been developed to keep students informed and current about program options within the department and the application process and guidelines to the B. Arch program. In each of the advisement session career opportunities are presented.

Advisement 01

During the students' 3rdsemester an advisement session is held in all ARCH 2312: Architectural Design III courses. The B. Arch Program Director visits all sections to review and distribute general information about the program options and how these can lead to different career opportunities.

Advisement 02

During the Students' 4thsemester an advisement session is held in all ARCH 2412: Architectural Design IV courses. The B. Arch Program Director visits all sections to review and distribute detailed information about:

- Program options
- Potential career paths
- B. Arch application guidelines for advanced standing students
- Licensure paths, requirements, and guidelines.

At this time, all students encouraged to sign-up for a one-on-one advisement session with a full-time faculty member to discuss their options and help them plan and map a trajectory

based on their career goals.

Advisement 03

Once students are officially admitted to the B. Arch Program students are required to meet with an advisor to individually review their degree audit and determine a plan for the successful completion of the program in a timely manner. These students will continue to meet with their advisors on a regular basis.

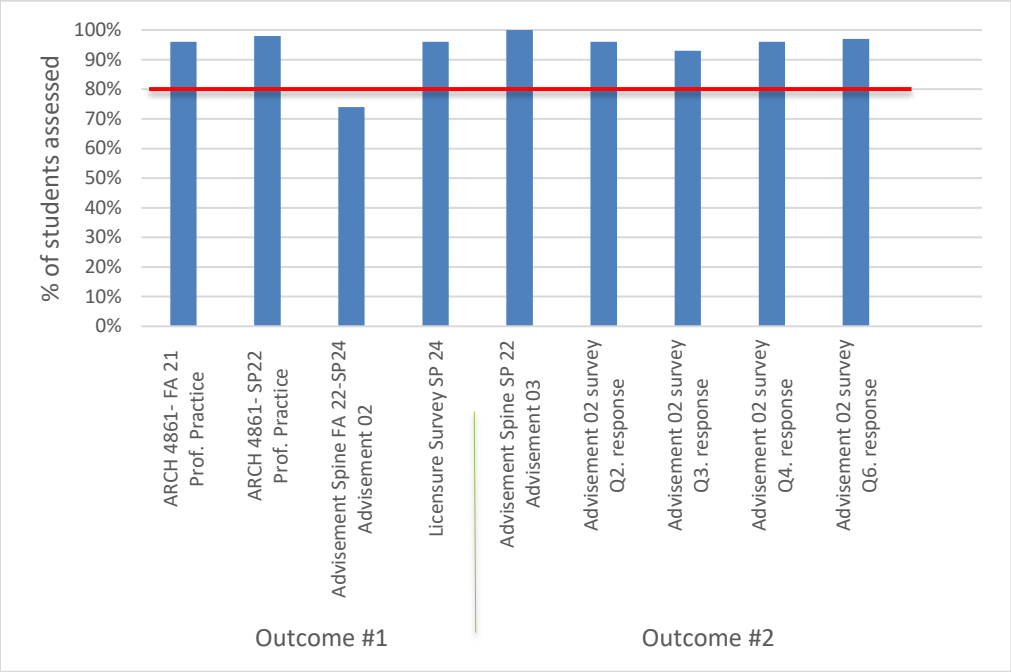
Description of the assessment measures and benchmarks:

Measure 01
- Assessment Measure: Percent participation in Advisement 03
- 80% of eligible students attend these sessions as scheduled in the curriculum
- Evidence: Advisement Module materials and Individualized reviews of Degree Progression

Measure 02
- Assessment Measure: Analysis of Selected questions from Advisement 02 pre and post survey
- 80% of participating students demonstrate understanding in the post survey Analysis
- Evidence: Survey analysis and raw data

PC.1 Assessment Cycle: Every 3 years at the end of the academic year

PC.1 Assessment Summary:



For the 2023-2024 cycle, the assessment results revealed that the students met the desired 80% benchmarks for Objectives 01 and 02 in all measures except for Measure 02 in Objective 01 where 74% of students on average participated in the Advisement 02 session.

For more detailed information please see: PC.1 Career Paths Assessment

Improvement Plan

The B. Arch program co-directors met with the key personnel noted in the assessment plan to discuss the assessment results and strategies to improve the outcomes for the following three-year cycle. After reviewing the assessment results and course activities and materials, the following observations were made, and next steps were outlined:

ARCH 4861- Professional Practice

Observations:

- The Assessment of student knowledge of the licensing process was evaluated through successful course completion and verified through the survey distributed during the required information session. In the future we must develop tools embedded within the course to directly assess this criterion.
- Currently the understanding of career path options is not being assessed on this course but is covered. Since this course is usually taken during the students' third or fourth year of the program, it makes sense to assess it at this juncture.

Next steps:

- To develop and standardize across all sections the Licensure Worksheet to better track the students' understanding of the licensure process in the course.
- A survey will be developed and deployed to document and track student understanding of career path options.

Advisement Spine

Observations:

- The advisement spine continues as a successful strategy for distributing information and sharing knowledge about different career opportunities. Since the last visit in 2022, we included the pre/post survey analysis as an additional assessment measures which further support the efficacy of this activity.
- Participation/Attendance decreased since the last assessment cycle,
- Although faculty meet regularly with students to discuss career plans during Advisement 03 there is little documentation of these discussions.

Next steps:

- Develop a plan to increase participation in Advisement 02 by 6% to meet the 80% benchmark.
- Develop a strategy for documenting student discussions during individual Advisement 02 and 03 meetings.

Licensure Survey

Observations:

- This is a required extracurricular activity for all 4th year B. Arch students. Since the last assessment cycle attendance has improved from 38% to 93%. This was achieved by pairing the information session with the 5th year Thesis Studio lottery.
- After the information session a survey was distributed to all the students (present and absent) to assess their knowledge and understanding of the licensure process. The survey results demonstrated that 80% felt confident about the licensure process, but only 60% demonstrated being familiar with the NCARB process compared to 81% during the previous assessment cycle. It is important to note that Professor Barbara Mishra, who was the department's NCARB Liaison and Arch 4861 course coordinator for many years had to step away from both positions due to medical leave followed by retirement in 2023. Professor Kenneth Conzelmann has taken over these responsibilities.

Next steps:

- The B, Arch Co-Directors will be working with the new ARCH 4861 Coordinator and NCARB liaison to design and implement a plan to increase dissemination of NCARB requirements and information

- A survey will continue to be conducted and required for all 4th students to continue to track their understanding of career path options and the licensure process.

It is important to note that in addition to the required activities listed above the college offers a myriad of non-required resources to complement, expose and inform the students to the range of career options and paths. To mention a few:

- Pre-Internship Programs
- Mentorship Programs
- Internship
- Lecture Series
- Invited speakers through the architecture Club
- Access to Lectures and Programs offered by both the AIA NY + Center for Architecture and the Architectural League of New York
- Workshops

PC.2 Design—How the program instills in students the role of the design process in shaping the built environment and conveys the methods by which design processes integrate multiple factors, in different settings and scales of development, from buildings to cities.

Program Response:

The architectural design process is the convergence of a myriad of factors that manifest themselves in the built environment. Through design we oscillate between conceptual intentions, pragmatic needs, formal desires, creative problem solving, and innovation.

The role of the design process is central to the curriculum of the B. Arch program and is supported by a sequence of eight required consecutive studios that build in complexity, resolution, and sophistication. The fifth and final year of the program, culminates with a thesis research project where students have agency over the selection of a research design topic. Each semester has been developed and carefully crafted to expose students to different project typologies, scales, settings, and discourse, while simultaneously engaging a multiplicity of methods and strategies for arriving at meaningful and cohesive formal and aesthetic architectural design solutions. As the sequence progresses, the integration of building systems, sustainable practices, structure, building technology, and materials evolves and is woven into the design process.

Taking advantage of the fact that the college is in New York City, studio projects typically use its rich urban setting as a canvas. Students are charged with understanding and researching the complex surrounding environment, historical context, and contemporary socio-economic and cultural forces and to consider them as catalysts that inform and manifest into current and relevant design provocations, requiring them to take a critical stance on how the design process can contribute to shaping the built environment.

A Design Sequence Committee maintains and assures the significance and flow of each design studio. The committee is composed of all studio course coordinators. Additionally, faculty from other courses are often included in the conversation encourage collaboration and build links across the entire curriculum. The committee meets on a bi-annual basis to discuss, evaluate, and asses the content, objectives, progression, and relevance of the design studio sequence within current architectural discourse and the profession. At these meetings, syllabi, assignments, and student work samples are reviewed and evaluated.

<u>Design Studio Sequence Overview:</u>

- **Year 01:** Introduces students to the foundations of architectural design, increasing their ability to perceive visual cues, create visual design, formulate concepts, and render

ideas in two and three dimensions. Students learn a combination of hand and digital skills to aid in the creation and interpretation of three-dimensional constructs and space. Notions of balance, order hierarchy, scale, form making strategies, and inhabitation are tested through an iterative process with a gentle introduction to context and program.
    - ARCH 1112 Architectural Design I Foundation I + Visual Studies I
    - ARCH 1212 Architectural Design II Foundation II + Visual Studies II

- **Year 02:** Introduces small- to medium-scale institutional project typologies. The year focusses on the synthesis of conceptual intentions driven by socio-cultural drivers, pragmatic needs, and formal explorations. The sequence builds in complexity by rigorously addressing program development, organization, and site integration. The introduction of structural systems and building envelope are leveraged as design opportunities.
    - ARCH 2312 Design III
    - ARCH 2412 Design IV

- **Year 03:** Introduces large-scale residential and commercial project typologies. Courses build on knowledge from the previous two years and focuses on the synthesis of conceptual intentions driven by economic and regulatory drivers. The first semester addresses adaptive reuse of buildings and involves the redesign and expansion of existing structures and introduces interior design, including FFE, as part of the design development process. The second semester examines the significance of public housing and integrates the health, safety, and welfare of the community at large.
    - ARCH 3512 Design V Adaptive Reuse Studio
    - ARCH 3612 Design VI Public Housing Studio

- **Year 04:** Introduces large-scale urban interventions and is the most intensive and comprehensive year of the sequence. It focuses on the synthesis of conceptual intentions influenced by sustainable practices, resiliency, and environmental drivers. The first semester requires students to look at the urban scale and imagine the impact of design through master planning. The second semester is an intensive exercise on building integration through high-rise building design. During this semester the students incorporate as part of the design process environmental control systems, building envelope systems, structural systems, and life safety systems.
    - ARCH 4712 Design VII Urban Design Studio
    - ARCH 4812 Design VIII Building Systems Integration Studio

- **Year 05:** Students are given agency over the selection of a design thesis topic. During the first semester, students work closely with a faculty advisor to assemble and evaluate comprehensive research on a pre-approved topic. The second semester focuses on integrating theory and practice. Students work under the guidance of a thesis advisor to develop and present work showcasing their professional and technical competency through a design proposal.
    - ARCH 5112 Architectural Design IX Thesis Research:
    - ARCH 5212 Architectural Design X Thesis

Activity Descriptions:

PROGRAM CRITERIA OBJECTIVE 01: How the program instills in students the role of the design process in shaping the built environment and conveys the methods by which the design processes integrate multiple factors.

1. DESIGN CURRICULUM COMMITTEE

The collection of studio courses leverages many factors as part of the design process.

Each studio prompt in the sequence has been developed to consider and integrate multiple criteria and requirements as part of the design process. The Design Curriculum Committee examines project briefs and assignments to ensure that students are exposed, consider, and integrate multiple factors as part of the design process that shapes the built environment.

- Assessment measure: Design Studio Sequence Assessment Survey
- Benchmark: 80% of the Committee agrees or strongly agrees the criteria is being met
- Evidence: Selected Survey questions and Meeting Minutes

PROGRAM CRITERIA OBJECTIVE 02: How the program instills in students the role of the design process in shaping the built environment and conveys the methods by which design processes integrate different settings.

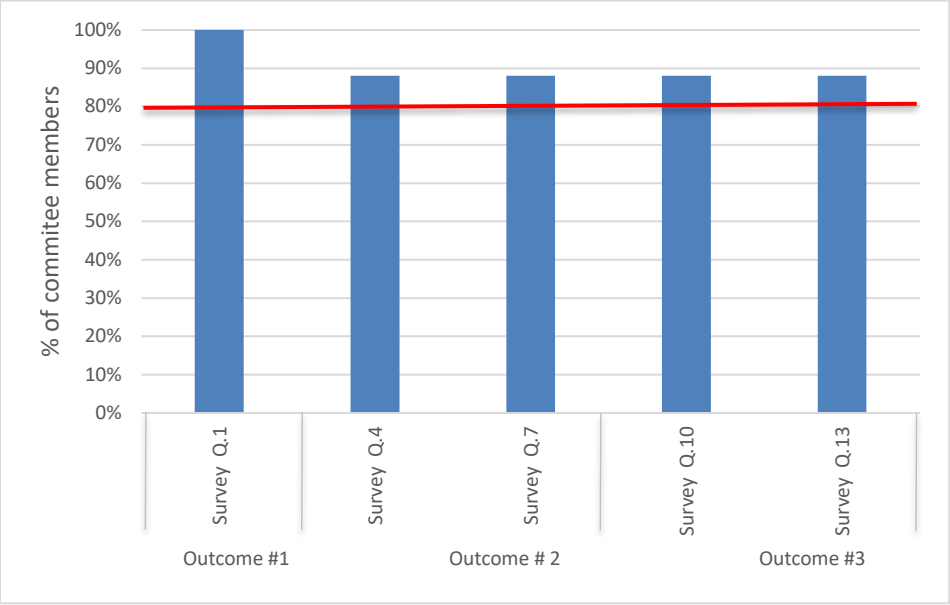
1. DESIGN CURRICULUM COMMITTEE

The studio sequence mines the rich and diverse context of New York City to expose students to a multiplicity of settings. Project sites are strategically selected with many criteria in mind including neighborhood density and scale, demographic make-up, natural and manmade features, access, environmental impact, and socio-economic and cultural relevance. Each studio in the sequence address variations within this criterion. As part of the design process, students are required to document and analyze the project context and respond to such through their design agenda. The Design Curriculum Committee examines project briefs and assignments to ensure that students are exposed to, consider, and integrate different settings as part of the design process that shapes the built environment.

- Assessment measure: Design Studio Sequence Assessment Survey
- Benchmark: 80% of the Committee agrees or strongly agrees the criteria is being met
- Evidence: Selected Survey questions and Meeting Minutes

PC.2 Assessment Cycle: Every 3 years at the end of the academic year

PC.2 Assessment Summary:



For the 2023-2024 cycle, all outcomes met or exceeded the 80% benchmark. However, there remains room for refinement across all areas. In response to the 2021-2022 assessment cycle, the following actions have been taken:

- A new project was developed and piloted in ARCH 1212: Foundations II, introducing topography as a factor to be integrated into the design process, considering various settings.
- The reorganization of the design sequence was presented to the full-time faculty and is currently under discussion.
- The Thesis sequence was revisited and restructured to offer students the option to pursue an independent research project or select from a series of directed research studio options. The new structure is scheduled for implementation in the 2024-2025 academic year.
- A module integrating the implementation of structural systems in the design process was designed and deployed in ARCH 2412 Design VI
- Design VI and VIII were revised to better meet and document SC.5 and SC.6

During this assessment cycle, the committee was particularly critical in the following areas:

- Project scales and scope
- Studio sequence (considering the switch of Design 7 and 8 in the sequence)
- Integration of Building System SC.6 requirements in Design VIII may be too taxing for a single course

For more detailed information please see: PC.2 Design Assessment

Improvement Plan

Based on the survey results and discussions recorded during the meeting minutes the Design Sequence Curriculum Committee agreed that the next steps for the commencing three -year cycle and improvement plan will include the following:

- **Develop and implement** a more rigorous and specific assessment method for addressing the areas noted above.
- **Create** an assessment plan to evaluate the new thesis structure.
- **Invite** a broader pool of faculty to participate in the evaluation process, including all faculty teaching design studio courses and those with expertise in particular modules or areas included in the projects.
- **Investigate and present** options to full-time faculty for adding a complementary course to ARCH 4812 Design 8 to meet SC.6 Building Integration requirements.
- **Hold** meetings to specifically address and discuss the integration of additional project site typologies and or contexts.
- **Pursue** action to reorganize the studio sequence swapping Design 7 and 8.
- **Meet** regularly to ensure we are meeting PC 2 criteria.

PC.3 Ecological Knowledge and Responsibility—How the program instills in students a holistic understanding of the dynamic between built and natural environments, enabling future architects to mitigate climate change responsibly by leveraging ecological, advanced building performance, adaptation, and resilience principles in their work and advocacy activities.

Program Response:

Our program has two series of required courses that address ecological knowledge and responsibility. The first series of courses are seminar classes that are technology-oriented, in which students gain knowledge and theory on ecological stewardship, design, and

sustainability while getting exposure to the tools and methods used to assess building performance. These courses are ARCH 3550_Building Performance Workshop and ARCH 3551_Sustainability: History and Practice, ARCH 3531_Building Technology IV, ARCH 1250_Site Planning.

The second series of courses are design studios that emphasize criteria in which students apply and synthesize the sustainable and ecological design knowledge and strategies they learned in the seminar courses to their design projects. These courses include ARCH 4812_Architectural Design VIII and ARCH 4712_Architectural Design VII.

Recently, our program launched a concentration 'Sustainability and Resilience'. This optional program is designed to provide guidance to explore specialties in the field of architecture and built environments. The program is available for bachelor programs, including both B. Tech. and B. Arch. program. For reference, there are two other concentrations available: 'Project Delivery' and 'Building Science'.

Activity Descriptions:

PROGRAM CRITERIA OBJECTIVE 01: Gain knowledge and theory on ecological stewardship, design, and sustainability through seminar courses, while getting exposure to assessment tools and methods.

ARCH 1250 SITE PLANNING

Students are introduced to the application of the fundamental techniques of site planning principles and the use of topographical maps and models. This course will explore the importance of site development as it relates to architecture and sustainable site development.

Description of the assessment measures and benchmarks:

- Assessment Measure: Successful Course Completion. Students complete a term project of site inventory/analysis/design to establish an understanding of the site and its impact on ecological stewardship.
- Benchmark: 80% of the students demonstrate proficiency with a C grade or higher.
- Evidence: Course Instructional Materials and College Grade Reports from the Office of Assessment

ARCH 3531 BUILDING TECHNOLOGY 4

Students are introduced to quantitative reasoning and information literacy, which is fundamental skills to move forward in integrated learning. As a part of the wider range of subjects in the course, students use their REVIT model for basic energy analysis. The model is further used to assess the design change and its impact on carbon footprint, focusing on the window-to-wall ratio as the main design variable to achieve a 5% reduction in energy use.

Description of the assessment measures and benchmarks:

- Assessment Measure: Selected Rubric Criteria: Building Performance analysis. As a part of the larger term project that uses BIM modeling students establish a basic understanding of a design's impact on the overall energy use of a building
- Benchmark: 80% of the students demonstrate proficiency with a C grade or higher.
- Evidence: Lecture and Assignment

ARCH 3550 or ARCH 3551

Starting in the Fall of 2022 Students must take one of two sustainability-focused courses as a requirement.

ARCH 3550 Building Performance Workshop- Students learn the theoretical foundation and metrics of environmental sustainability at the building scale. The subjects include solar geometry, heat transfer in buildings, thermal properties of building materials, occupant comfort, vernacular techniques, passive heating, natural ventilation, and urban microclimate. The learnings are substantiated with workshops and hands-on materials, by using computer simulations, including climate analysis, daylighting for light level and visual comfort, and passive design for carbon footprint reduction and occupant comfort. Hand-held environmental sensors are utilized for field surveys, regarding heat loss and microclimate.
Description of the assessment measures and benchmarks:

- Assessment Measure: Successful Course Completion. Students complete a term project to apply ecological concepts and metrics.
- Benchmark: 80% of the students demonstrate proficiency with a C grade or higher.
- Evidence: Course Instructional Materials and College Grade Reports from the Office of Assessment

In the ARCH3551 Sustainability: History and Practice course students undertake semester-long projects to investigate cities and buildings recognized for their sustainability. They examine the principles of sustainability, focusing on environmental and material resource use. The required reading for the course is "Cradle to Cradle," a seminal text that outlines ecological systems. Students are expected to write a report on each chapter, which will serve as foundational information for their research. Additionally, weekly exercises will engage students with contemporary topics related to sustainability, including environmental policy, resilience, equity, and economic factors.

Description of the assessment measures and benchmarks:

- Assessment Measure: Successful Course Completion. Students complete a semester long research project and a final term paper to establish an understanding of ecological knowledge and be able to describe it.
- Benchmark: 80% of the students demonstrate proficiency with a C grade or higher.
- Evidence: Course Instructional Materials and College Grade Reports from the Office of Assessment

PROGRAM CRITERIA OBJECTIVE 02: Application and synthesis of knowledge and strategies for sustainable and ecological design.

ARCH 4712 ARCHITECTURAL DESIGN 7

ARCH 4712 focuses on urban design and planning. As part of the course's learning objectives, students engage in site research that includes climatological and ecological elements, incorporating future projections of heat, rainfall, and flooding. These factors form a foundational part of the schematic process for designing sustainable cities and neighborhoods. The course examines multiple models and philosophies closely related to sustainable urban planning practices, such as the Circular Economy and Sponge Cities. However, these may not be applied uniformly across all sections.

The design responses informed by these philosophies involve incorporating adaptive and resilient features into urban planning. For example, integrating green roofs, permeable pavements, and rain gardens (elements of sponge city design) while also considering the reuse and recycling of materials (principles of the circular economy) helps create urban environments that are both sustainable and adaptable to future climatic challenges.

These approaches ensure that urban designs are not only resilient but also contribute to broader sustainability goals by reducing waste, managing resources efficiently, and adapting to changing environmental conditions. Additionally, as part of the design process, students are required to research the geographies of cultural demographics, such as age, income, race, and language, to better understand and define design goals and responses.

● Assessment Measure: Successful Course Completion. Students complete a term project to establish an understanding of ecological concepts and their impact on the urban environment.

- Benchmark: 80% of the students demonstrate proficiency with a C grade or higher.
- Evidence: Course Instructional Materials and College Grade Reports from the Office of Assessment

ARCH 4812 ARCHITECTURAL DESIGN 8

Students adopt ecological concepts and their impact as the major considerations for large-scale non-residential mixed-use buildings. Depending on the instructor and available resources, quantitative tools and methods are adopted to analyze and determine environmental sustainability and resilience while theoretical backgrounds are reinforced through lectures. Across all sections, the precedents research and design reviews are in place for critical design syntheses toward the ecological impact of buildings.

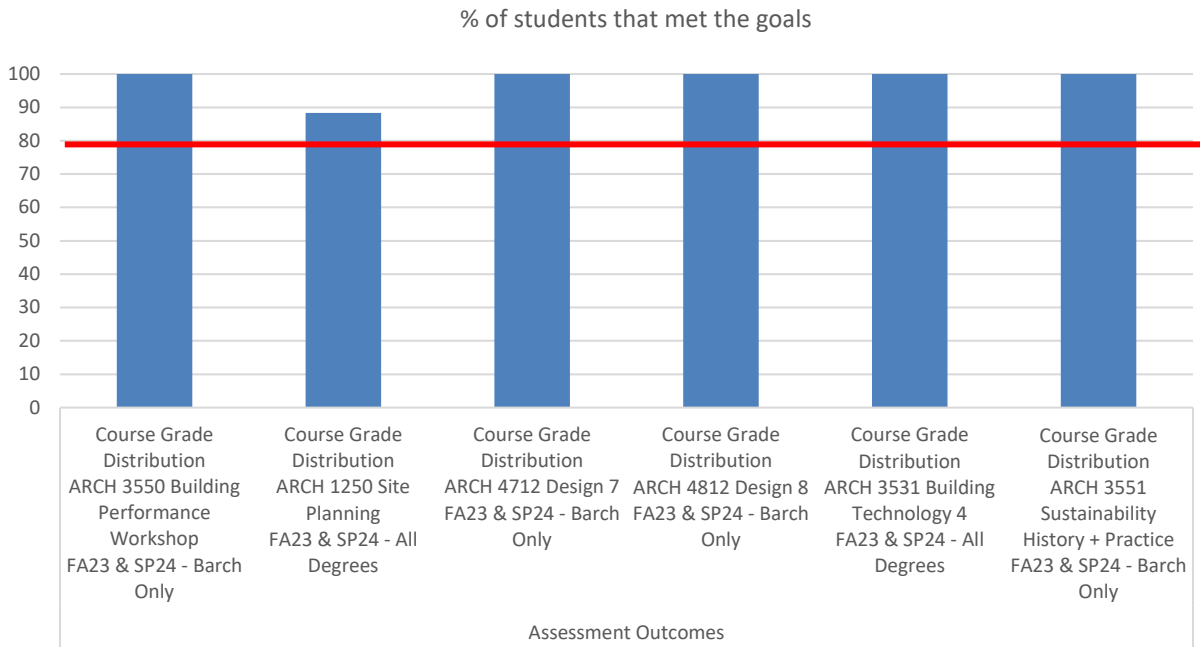
Description of the assessment measures and benchmarks:

- Assessment Measure: Successful Course Completion. Students complete a term project to apply ecological concepts and their impact on a large-scale non-residential mixed-use building project.
- Benchmark: 80% of the students demonstrate proficiency with a C grade or higher.
- Evidence: Course Instructional Materials and College Grade Reports from the Office of Assessment
-

PC.3 Assessment Cycle:

Every 3 years at the end of the academic year

PC.3 Assessment Summary:



Assessment results showed that the student's proficiencies were above the 80% goal in all measures for the 2023/24 Academic year.

In the previous assessment cycle, the department decided ARCH 3551 or/and 3550 to be required courses for the students to have a rigorous understanding of how future architects mitigate climate change responsibly by leveraging ecological, advanced building performance, adaptation, and resilience principles in their work and advocacy activities. It has been implemented in the student's coursework since the 2022 Fall semester as planned. As a result, all BARCH students completed either ARCH 3550 or 3551.
The instructors have been and will be constantly discussing the curriculum updates with the key personnel.

For more detailed information please see: PC.3 Ecological Knowledge and Responsibility Assessment

Improvement Plan

While we found the current course work provided the sufficient knowledge and application for students to meet the PC.3 Ecological Knowledge and Responsibility, the courses will be further improved as follows:

ARCH 1250 Site Planning:
The course aims to establish the foundation of ecological knowledge and responsibility. We continue to improve our course materials and assignments for further refinements.

ARCH 3531 Building Technology 4:
The module has been improved to establish more consistent results across all the sections. Conducting the same analysis at another phase later in the design process is being considered to reinforce the skills introduced earlier in the semester.

ARCH 3550 Building Performance Workshop:
In the Fall of 2023, building level carbon accounting was implemented and refinement is ongoing

ARCH 3551 Sustainability History and Practice:
Over the next few years, the Arch 3551 course will increasingly emphasize resilience and Disaster Risk Reduction (DRR). Integrating resilience and sustainability as interconnected concepts is essential to the course objectives. Additionally, the course will align with the AIA Framework for Design Excellence, facilitating a more comprehensive understanding of sustainable and resilient practices across various design disciplines. The Framework's ten principles address issues of social justice and equity. Class examples will include projects recognized by the AIA Committee on the Environment (COTE) Top 10 Awards, which exemplify the challenges and standards set by the Framework for Design Excellence.

Resources:
UNFCCC - SDGs - Sustainable development goals
IPCC Report
Sendai DRR Framework
AIA Framework for Design Excellence

ARCH 4712 Architectural Design 7:
The course coordinator in collaboration with the B. Arch the Co-Directors continue to meet to discuss and develop a strategy to standardize NAAB requirements and measure all sections while still allowing for a variety of philosophical approaches to urban design.

ARCH 4812 Architectural Design 8:
Starting in the Spring of 2024, the course coordinator and all instructors integrated energy modeling in all sections. That summer a more rigorous integration was tested which allocated more time on design explorations and iterations. (Note that this summer session was for BTech, not BArch students) The results will be analyzed, and necessary modifications will be implemented in the Fall of 2024 for our BArch students.

PC.4 History and Theory—How the program ensures that students understand the histories and theories of architecture and urbanism, framed by diverse social, cultural, economic, and political forces, nationally and globally.

Program Response:

History and Theory of architecture are taught at City Tech to take advantage of the college's unique location in a thriving and ever-changing urban metropolis whose vast diversity is represented in the cultural backgrounds of the students matriculated at the College. Our program seeks to inculcate the students with the diverse range of intellectual and geographic sources of architectural ideas that uncover how those practices are brought to bear on existing and future formations of urban society.

History Courses
There are three required history courses for students enrolled in B. Arch and B. Tech programs at City Tech. The first two survey the evolution of architecture through its technical innovation and how this accompanies social changes and traditions within individual world cultures. The third course requires students to explore their New York City home as a repository of human history as it is written within the physical environment, focusing on the political, social, and technical forces that have shaped the urban context over time.

Theory Courses
The theory classes consider both formal and sociological concepts that have engaged architectural thinking throughout the ages with a specific focus on "modern" times from the Enlightenment to contemporary trends and practices. Readings, assignments, and in-class discourses frame the range of formal imperatives that dominate particular periods and cultures and explore the role of architecture in shaping human behavior.

Activity Descriptions:

PROGRAM CRITERIA OBJECTIVE 01: How the program provides students with a solid foundation for understanding architecture as a humanistic and technological endeavor framed by diverse social, cultural, economic, and political forces, nationally and globally.

1. **ARCH 1121_A HISTORY OF WORLD ARCHITECTURE TO 1900**

   This course is a historical survey of architecture from early civilizations to the Industrial Revolution. Architecture is examined as an expression of the culture and life of a society. Class sessions study architecture from around the world within its social, temporal, and spatial contexts. While the history of Western architecture is covered from ancient Egypt to the Enlightenment, a special focus is directed to the architectures of the Far East, South Asia, Africa, pre-Columbian Latin America, the Islamic World, and elsewhere to provide a comprehensive overview of the richness and diversity of world architecture as a cultural artifact.

   - Assessment Measure: Pass rate for the course. Professors use a combination of reading notes, short papers, quizzes, exams, and oral presentations to assess students' historical knowledge, vocabulary, and ability to apply principles to architectural analysis.

- Benchmark: 80% of the students pass the course with a ‘C’ or better
- Evidence: Course Instructional Materials and College Grade Reports from the office of Assessment

2. ARCH 2321_A HISTORY OF ARCHITECTURE 1900-PRESENT

This course is a comprehensive study of modern architectural movements from the 1900's to the present day. Architects and their buildings are explored in relationship to their cultural, artistic, philosophical, historical, and technological contexts.

- Assessment Measure: Pass rate for the course. Professors use assignment Rubrics that assess students’ understanding of the conceptual, aesthetic, and technological background of contemporary architecture, ability to recognize the major architects of the 20th century and be familiar with their work, use the analytical terminology of architectural history, and demonstration of quality analysis of the works studied.
- Benchmark: 80% of the students pass the course with a ‘C’ or better
- Evidence: Course Instructional Materials and College Grade Reports from the office of Assessment.

3. ARCH 3522_A HISTORY OF NEW YORK CITY ARCHITECTURE

This course is a historical analysis of the city's infrastructure, real estate development, municipal planning, and key buildings. This course traces the pathway of American history from a village to a city, which is the commercial and cultural hub of the nation. Dynamic socio-determinants emerging because of improvements and growth in technology, transportation, infrastructure, real estate, commerce, housing, and recreation. In our built-up urban environment, appreciation and knowledge of historic buildings is essential for the architect. Recognizing period styles and forms allows the architect to design new buildings in context. More importantly, understanding past construction technologies and materials enables the architect to adapt and reuse existing buildings for current programs. Rehabilitation of the old saves today's resources and promotes sustainability.

- Assessment Measure: Pass rate for the course. The course focuses on the development of a research paper which assesses students’ understanding of a contemporary building in the context of a dense historic urban neighborhood.
- Benchmark: 80% of the students pass the course with a ‘C’ or better
- Evidence: Course Instructional Materials and College Grade Reports from the office of Assessment

PROGRAM CRITERIA OBJECTIVE 02: How the program provides students with a solid foundation of correlation of the theories of architecture and the practice of architecture across diverse social, cultural, economic, and political spectrums, nationally and globally.

1. ARCH 4722_THEORY I: THEORY OF TECHNOLOGY IN ARCHITECTURE

This course considers the idea of a “temporal concept of architecture” – that theories of architecture conform to the contemporaneous discourse within a culture at a particular time, and that as this discourse evolves and changes, what is believed to be an authentic architecture for that culture changes accordingly. This course considers further that shadowing this temporal flow is the influence of ever-emerging technological advances that shape human understanding - the technology that is the driving force behind architectural thought and practice since the Enlightenment. In this course students explore through the writings of theoreticians and historians of

architecture the role theory plays in the creation of architecture across history, approaching the understanding of architecture as a discourse between the author and the artifact, be it the architect and the building at one scale or a society and its urbanism at another.

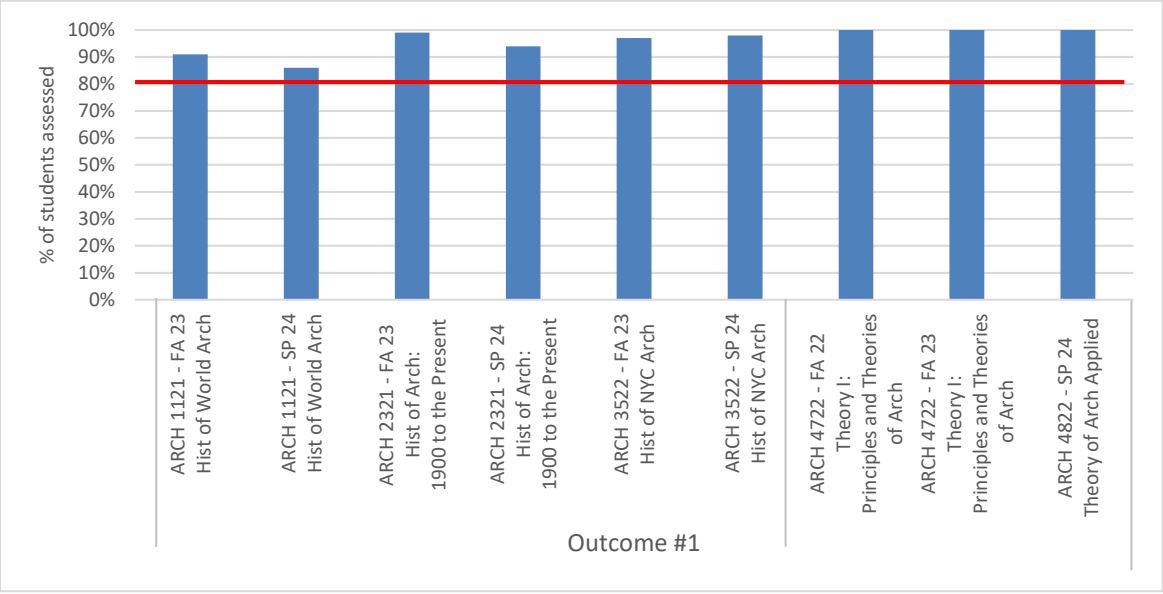
- Assessment Measure: Students demonstrate a solid understanding of the correlation between ideas and concepts of architecture and the practice of architecture across varied cultural spectrums at different times in history
- Benchmark: 80% of the students pass the course with a 'C' or better
- Evidence: Course Instructional Materials and College Grade Reports from the office of Assessment

2. **ARCH 4822 THEORY II_ARCHITECTURAL THEORY APPLIED**
This course applies design theory to form an independent vision based on precedent and critical reasoning. Students learn to conduct research and assemble a unique reference collection of architectural theory and design case studies as a basis for application to design courses.

- Assessment Measure: Pass rate for the course. Assignment Rubrics that assess students' understanding of the parallel and divergent histories of architecture and the ability to connect theory to the diverse needs, values, behavioral norms, and cultures of architectural works
- Benchmark: 80% of the students pass the course with a 'C' or better
- Evidence: Course Instructional Materials and College Grade Reports from the office of Assessment

PC.4 Assessment Cycle: Every 3 years at the end of the academic year

PC.4 Assessment Summary:



For 2023-2024 all outcomes met or exceeded the 80% benchmark objective.

For more detailed information please see: PC.4 History and Theory Assessment

Improvement Plan

ARCH 1121, 2321 and 3522 History Sequence

Observations:

The majority of the students matriculated in the three history courses, ARCH 1121, ARCH 2321 and ARCH 3522 are Bachelor of Technology students who performed at varying levels of competence, particularly in the first-year course in the sequence, ARCH 1121 History of World Architecture. And although we meet the criteria for the students who successfully complete the course, there is a large withdrawal rate. Since the last assessment cycle and accreditation visit in 2022 these numbers have remained stable. It is important to note that the department met its goal to increase the recruitment of faculty with training as academic historians to keep content and methodology fresh in these courses. And more significantly, Professor Elena M'Bouroukounda, a PHD candidate at Columbia's Columbia Graduate School of Architecture, Planning and Preservation, was hired as full-time lecturer in the Fall of 2023 and is currently working with faculty to improve these numbers.

Nest Steps:

- Course coordinators during the next assessment cycle will assess their course sections to assure that the material covered is consistent across all the sections and implement changes as needed.
- Cours coordinators for ARCH 1121 will implement standardized final assessments across sections for the 2024/25 academic year. As a final assessment for the course, all students must provide a research report about a selected building. The report will demonstrate students' ability to describe and contextualize architectural precedent within diverse cultural and social contexts. The reports will measure the acquisition of research skills acquired throughout the course, including but not limited to accessing digital databases, gathering visual archives, and citing secondary academic sources.
- The long-term improvement plan will focus on reducing attrition rates for these courses, particularly the for the first course in the sequence.

ARCH 4722: Theory I: Principles and Theories of Architecture

Observations:

Architecture 4722 was a new course developed for the B. Arch Program and is constantly being fine-tuned. It was assessed for the fist time during our last accreditation visit in 2022. In previous years, the teaching of theory in this class relied primarily on the writings of architects and architectural historians who framed the discourse at a particular moment in time. Starting the 2024 academic year, students are introduced to philosophers from history who engaged questions of materiality, form, logic and reason, and human existence in the world, offering a lens on how humanity has looked at the world at strategic points in history. By combining a broader philosophical viewpoint with the focus of architectural theory, this course hopes to open the students to theory as a daily practice in their understanding of their world, and not just a narrow field practiced by a few academic insiders.

Next Steps:

- At the conclusion of each semester, the lectures, discussions, and assignments are assessed to determine how well the students engaged the material and how their responses, verbal and written, grasped the concepts.
- Refinements will be made, less effective material removed, and new topics added to enhance a full view of architectural theory as it changed in history up to and including the Modern Movement.

ARCH 4822: Theory II: Architectural Theory Applied

Observations:

Similarly to ARCH 4722, ARCH 4822 was a new course developed for the B. Arch Program and is constantly being fine-tuned. Since the last assessment cycle one of the most important tasks has been coordination between the two courses to ensure that the content is not being repetitive, and that the curriculum provides a broad and well-balanced array of topics and philosophies.

Next Steps:

- At the conclusion of each semester, the lectures, discussions, and assignments are assessed to determine how well the students engaged the material and how their responses, verbal and written, grasped the concepts.
- During the 2024/25 academic year assignments will be expanded to require students to write an in-depth critical analysis in the form of a 10-page paper in addition to weekly written reflections. At the end of the term these will be assessed to continue to build structure and rigor in the course.

PC.5 Research and Innovation—How the program prepares students to engage and participate in architectural research to test and evaluate innovations in the field.

Program Response:

The Bachelor of Architecture Program prepares students to engage and participate in architectural research, test, and evaluate innovations in the field through a curriculum based in advanced building science and taught by leading practitioners. The students study the state of contemporary building systems and assembly technology during the integrated design studio ARCH 4812_Architectural Design VIII, using this as the basis to develop their own building systems related to their thesis design problem. The students work in the core classes culminating in the year-long Thesis Studio where the students research their own solutions to their own architectural problems. In the thesis year, students explore a complex problem of their choice, define their own program, and develop their design process and research to formulate creative solutions. In ARCH 5112_Architectural Design IX, the students spend the first half of their thesis developing a research problem for a chosen site and program based on their own interests. In ARCH 5212_Architectural Design X, the students use the first semester content as the basis for applied research in the form of an architectural project. The two-semester research project is documented in an individual publication and presentation of the year's work.

Activity Descriptions:

PROGRAM CRITERIA OBJECTIVE 01: How the program prepares students to engage and participate in architectural research to test and evaluate innovations in the field.

1. **ARCH 4812_ARCHITECTURAL DESIGN VIII**

   Students adopt environmental sustainability as one of the major considerations for large scale commercial buildings. Depending on the instructor and available resources, quantitative tools and methods are adopted to analyze and design a built environment toward healthier, lower energy and more comfortable environment, emphasizing the role of facade and building. Across all sections, the precedents research and design reviews in place for critical design syntheses toward ecological impact of buildings.

   - Assessment Measure: Successful Course Completion. Students complete a term

project that Integrates the energy modeling into design process to learn how ecological knowledge and systems integration can contribute to the wider architectural discourse through research and custom design solutions.
- Benchmark: 80% of the students demonstrate proficiency. (Grade C or higher)
- Evidence: Course Instructional Materials and course Coordinator Grade Reports for selected questions

2. ARCH 5112_ARCHITECTURAL DESIGN IX

Architectural Design IX is the first semester of a yearlong thesis studio working closely with a faculty advisor. Students assemble comprehensive research on a pre-approved topic. Research includes user needs, precedent studies, site analysis, along with social, cultural, historical, and technical implications of a proposed architectural intervention. Thesis research clearly focuses on the selected area of study presenting well-formed arguments to advance student approaches to architectural design and methodology. Students will prepare a comprehensive document that includes their research and analysis, a written project statement along with all design methodology as part of their final presentation.

- Assessment Measure: Successful Course Completion. Thesis Faculty Advisers and guest Readers will analyze the final presentation and documentation of the students' research in a variety of aspects to guide their final thesis decisions.
- Benchmark: 80% of the students demonstrate proficiency. (Grade C or higher)
- Evidence: Course Instructional Materials and course Coordinator Grade Reports for selected questions

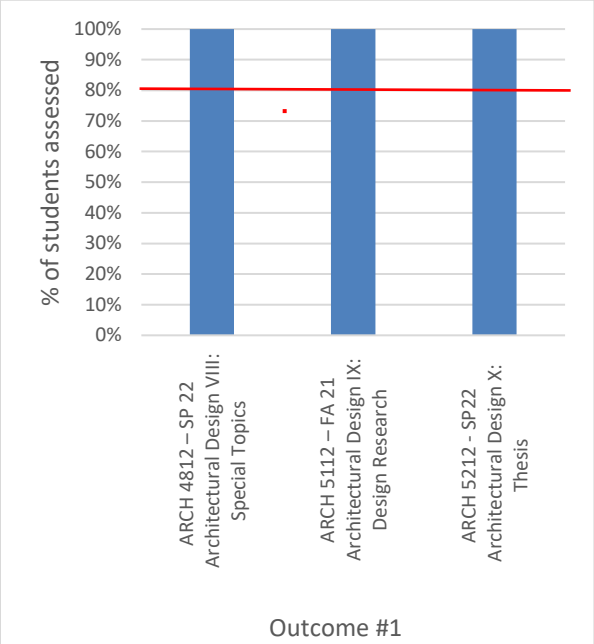
3. ARCH 5212_ARCHITECTURAL DESIGN X

Architectural Design X is the second semester of a yearlong thesis studio working closely with a faculty advisor. Students will use the research from the previous semester's work to develop a project solution that addresses the questions raised in Design IX. Students will prepare a comprehensive thesis publication and presentation that includes their research and analysis along with the design solution.

- Assessment Measure: Successful Course Completion. Thesis Faculty Advisers and guest Readers will analyze the final presentation and documentation of the students' research in a variety of aspects to guide their final thesis decisions.
- Benchmark: 80% of the students demonstrate proficiency. (Grade C or higher)
- Evidence: Course Instructional Materials and course Coordinator Grade Reports for selected questions

PC.5 Assessment Cycle: Every 3 years at the end of the academic year

PC.5 Assessment Summary:



For 2023-2024 cycle, the assessment results revealed that the students met the 80% benchmark.

For more detailed information please see: PC.5 Research and Innovation Assessment

Improvement Plan

Since the last evaluation in 2022, the ARCH 5112 and 5212 Thesis courses have undergone refinements to enhance the alignment of students' research interests and objectives. These adjustments aim to better support the research phase by allocating additional time for testing and iteration during the design phase.

Furthermore, in response to the increasing enrollment in the program and acknowledging the need for greater structure and guidance, the Bachelor of Architecture (B. Arch) program will introduce a new component starting Fall 2024. Alongside supporting independent research thesis projects, students will have the option to select from a series of research-focused studio course offerings in their final year.

These new studios will be developed and led by faculty members, incorporating their research agendas and expertise. The effectiveness of this new format will be evaluated at the conclusion of the 2024/25 academic year, with results to inform further development and improvements. Additionally, these studios will leverage the invaluable depth of knowledge and expertise of our faculty, creating a synergetic relationship that benefits both students and instructors.

PC.6 Leadership and Collaboration—How the program ensures that students understand approaches to leadership in multidisciplinary teams, diverse stakeholder constituents, and dynamic physical and social contexts, and learn how to apply effective collaboration skills to solve complex problems.

Program Response:

The Department of Architectural Technology at City Tech encourages cultural awareness and

understanding within its diverse student body by developing collaborative skills and leadership among students. The curriculum has developed over the years to assure that collaboration is fully integrated into multiple courses and assignment types, and that students develop a broad understanding of the stakeholders, constituents, and project team members, and their roles and responsibilities in shaping the built environment. Below are descriptions of each activity and its assessment:

Activity Descriptions:

PROGRAM CRITERIA OBJECTIVE 01: How the program ensures that students learn how to apply effective collaboration skills to solve complex problems.

1. **ARCH 3531_BUILDING TECHNOLOGY IV**

   In ARCH 3531 Building Technology IV students work in teams to put together a Design Development set of drawings for a mid-rise building, providing an opportunity to practice and experience aspects of design collaboration and file sharing that would take place in a professional setting.

   - Assessment Measure: Assignment rubric addressing participation in the team projects
   - Benchmark: 80% of the students demonstrate proficiency with a C grade or higher to collaborate and share files for the good of the team
   - Evidence: Course Instructional Materials

2. **ARCH 4712_ARCHITECTURAL DESIGN VII_URBAN DESIGN**

   In ARCH 4712 Architectural Design VII Urban Design, students work in teams. Students assume the responsibilities of leadership in directing the efforts of a group and determining priorities and establishing goals. Students work in teams in the development of a design manual with narrative summarizing solutions with justification to create a consensus program/solution

   - Assessment Measure: Assignment Rubric addressing participation in the UrbanPlan Workshop
   - Benchmark: 80% of the students demonstrate proficiency with a C grade or higher
   - Evidence: Course Instructional Materials, UrbanPlan assignment grades

PROGRAM CRITERIA OBJECTIVE 02: How the program ensures that students understand approaches to leadership in multidisciplinary teams, diverse stakeholder constituents, and dynamic physical and social contexts

1. **ARCH 4712 URBAN DESIGN**

   ULI's UrbanPlan is a 15-hour project-based learning curriculum developed for universities – engaging both undergraduate and graduate students. Over the course of the UrbanPlan unit, students take on roles and form teams to respond to a Request for Proposals for a fictitious site which consists of vacant land and several existing buildings. They must reconcile the often-competing agendas and consider tradeoffs to create a well-designed, market-responsive, and sustainable project. Each team creates a financial pro forma and a physical model of their plan and presents their proposal to a mock City Council that awards the development contract to the winning team.

UrbanPlan is supported by trained ULI volunteers who are professionals in all disciplines of land use and development, who are selected for their depth of experience and knowledge. During the Fall 2021 semester, ARCH 4712 developed the structure of the course to integrate the ULI unit and produced and ran assignments inspired by it. The module was refined in Spring 2022 and was fully deployed beginning with the Fall 2022 semester. Students' projects address the following:

- Demographic evaluation
- Meeting with Representation from the various stakeholders: Govt, community, owners, users
- Program review of Stakeholders criteria
- ULI Volunteer Team assessments, student reflections

UrbanPlan has run as a component in all sections of ARCH 4712 Urban Design since Fall 2022.

- Assessment Measure: Assignment Rubric addressing participation in the UrbanPlan Workshop
- Benchmark: 80% of the students demonstrate proficiency with a C grade or higher
- Evidence: Course Instructional Materials, UrbanPlan assignment grades

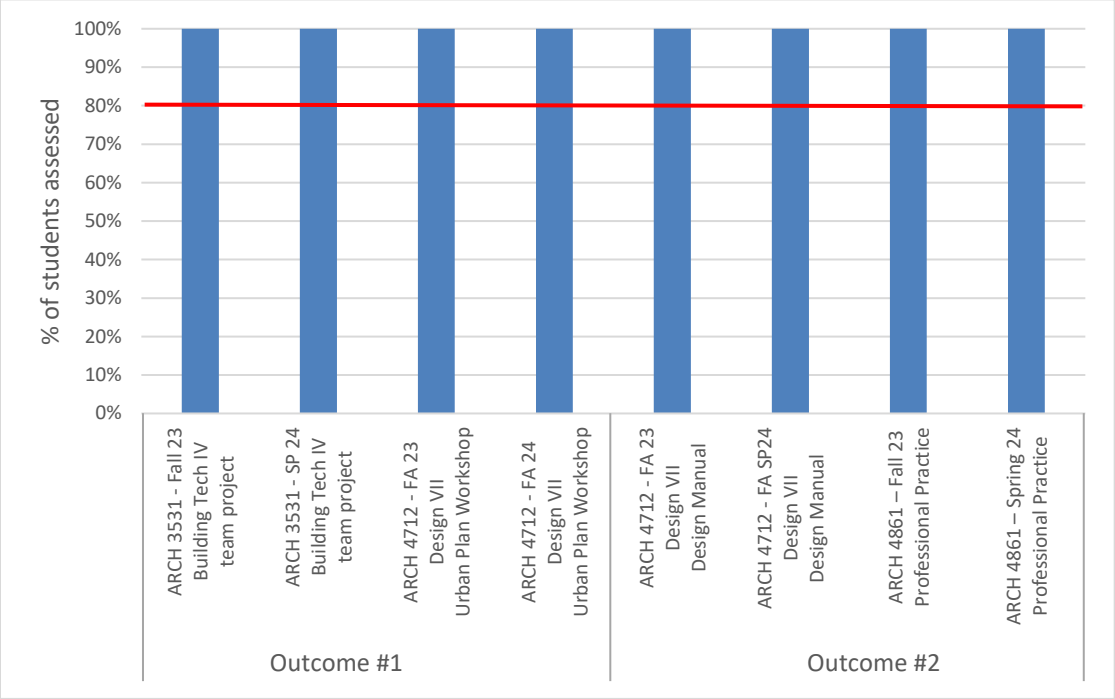
2. ARCH 4861_PROFESSIONAL PRACTICE

Students' assignments and in-class discussions address the following:

- Selection/management of A/E/C Teams
- Identify stakeholders, their criteria
- Building project consensus around project goals and schedule milestones
- Ethical responsibilities to social / political / economic needs and criteria
- Assessment Measure: Assignment Rubric addressing case studies, exam questions
- Benchmark: 80% of the students demonstrate proficiency with a C grade or higher
- Evidence: Course Instructional Materials and Selected exam question

PC.6 Assessment Cycle: Every 3 years at the end of the academic year

PC.6 Assessment Summary:



2023-2024 assessment results:

- ARCH 3531 – 100% of students met the benchmark for proficiency
- ARCH 4712 – 100% of students met the benchmark for proficiency
- ARCH 4861 – 100% of students met the benchmark for proficiency

For more detailed information please see: PC.6 Leadership and Collaboration Assessment

Improvement Plan

Observations:
The improvement plan from the prior cycle met with good success in the ARCH 4712 Urban Design studio with all sections implementing the UrbanPlan workshop with the updated ULI curriculum beginning in fall 2022. As planned, the module is introduced early in the semester, giving students the opportunity to apply lessons from the Urban Plan exercise to their term projects.

Additionally, ARCH 4861 Professional Practice faculty have been able to engage students in office visits and classroom activities with the return to in-person instruction, with significantly improved student success in meeting course PCs and SCs.

Next Steps:
The B. Arch program directors meet and discuss the assessment results and strategies to improve the outcomes for the following year. Below is a list of suggestions for improvement.

General #3: Provide more structured reporting guidance and follow-up for ARCH 4861 Professional Practice faculty

Outcome #1: Improved reliability of the assessments.

PC.7 Learning and Teaching Culture—How the program fosters and ensures a positive and respectful environment that encourages optimism, respect, sharing, engagement, and innovation among its faculty, students, administration, and staff.

Program Response:

The Department of Architectural Technology at City Tech employs four strategies to create a positive and respectful environment that encourages optimism, respect, sharing, engagement, and innovation. These are long standing strategies that faculty recognize as creating optimal conditions for improved performance and engagement by the students. Each of these are reviewed and assessed on an annual basis by the Department Chair, program directors and the department appointments committee.

Activity Descriptions:

PROGRAM CRITERIA OBJECTIVE 01: How the program creates an environment in the classroom and studios to encourage sharing, engagement and to support innovative thinking. An active learning environment is created when instructors and students engage in an open dialogue channeling technical, historic, and aesthetic knowledge towards a discovery of shared experiences and context for the lessons. Students are encouraged to interact and support each other to discuss and solve problems.

1. **DESIGN STUDIO REVIEWS**

   Since most of our students have never participated in a project review or discussion, these courses are a critical step to establishing the tone and format for sharing work, presenting experiences, and engaging each other in a constructive dialogue. Experienced instructors are aware that a course objective, beyond technical, is to inspire a positive and respectful learning environment drawing together lessons being learned in other courses.

   - Assessment Measure: Open Final Review Participation
   - Benchmark: 80% of design studios are participating in open final reviews
   - Evidence: Final Review Schedule

PROGRAM CRITERIA OBJECTIVE 02: How the program fosters sharing, engagement, and innovation among its faculty, administration, and staff by sharing instructional resources, teaching techniques and strategies to improve course delivery across multiple sections.

1. **COURSE COORDINATION**

   Regular meetings between full time and adjunct faculty allow for shared teaching techniques and refinement of course materials to address student engagement and comprehension. At regular coordination meetings full-time faculty work to build camaraderie between instructors. The discussion of course objectives and context raise course delivery standards. Resource sharing and course manuals ease course-prep burden on adjunct faculty allowing more attention dedicated to an active learning environment and improved student learning outcomes. This is particularly important for first year courses.

   - Assessment Measure: Course Coordination meetings schedule
   - Benchmark: 80% of course coordinators are holding these meetings once a semester
   - Evidence: Chart of course coordinators and meeting dates

PROGRAM CRITERIA OBJECTIVE 03: How the program ensures an environment that encourages optimism, positivity, respect, sharing by bringing students and faculty together to highlight achievement and opportunities.

1. **TOWN HALLS**

   Regular town hall meetings for all faculty and students create a forum for a broad-based discussion of existing and proposed programs, curriculum modifications and physical plant changes. Bringing the department together allows students to ask questions directly to the Department Chair, Program Directors, and faculty members. Student and faculty achievements are highlighted. The nature of these meetings is respectful, and students surveyed report the meetings are "*useful and helpful*".

   - Assessment Measure: Student Participation
   - Benchmark: Demonstrate an increase in student participation numbers and participation survey results
   - Evidence: Schedule of Town Hall meetings, Agendas and Attendance.

PROGRAM CRITERIA OBJECTIVE 04: How does the program encourage engagement and innovation to promote exploration, research, and lifelong learning.

1. **INTEGRATION OF GENERAL EDUCATION OBJECTIVES**

   Gen-Ed skills are essential for a positive and respectful academic environment. Students need encouragement to use reading, writing and research assignments to grapple with relevant current events and develop their voices. Opportunities to present issues from their community or country of origin is another means to consider the impact of architecture on the environment. In ARCH 1231_Building Technology I, faculty implement a special program on reading effectively in the disciplines. It focuses on improving learning-culture and study techniques of first-year students. Students provide positive feedback on the significance these techniques have on their learning experience and the engagement they feel from faculty helping them succeed.

   - Assessment Measure: Integration of General Education objectives into course syllabi.
   - Benchmark: 80% of courses list Gen Ed learning objectives on course syllabi
   - Evidence: Course outlines demonstrating integration of gen-ed objectives.

PC.7 Assessment Cycle: Every 3 years at the end of the academic year

PC.7 Assessment Summary:

For 2023-2024 cycle, the assessment results revealed that the department met the 80% benchmark except for participation in open reviews and participation on Town Hall meetings.

For more detailed information please see: PC.7 Learning and Teaching Culture Assessment

Improvement Plan:

Observations:

- Open Review Participation- All our design studios hold final reviews with jurors but not all faculty submit this information for record keeping. We need to improve on getting faculty to submit their schedule and list of jurors so that we can improve our publicity of these events.

- Town Hall Meetings – The department held two successful town halls during the 2023/2024 academic year that were well attended by both faculty and students. There is always room for improvement to increase attendance. Spring March
- Course Coordination – While the department makes a strong effort to ensure that course coordination meetings are being held, we continue to work on improving the documentation of these meetings. Adjunct faculty are typically more challenging to coordinate because of extracurricular commitment.
- Integration of Gen Ed Objectives - The Department actively participates and finetunes the integration of Gen-Ed course objectives. In reviewing the course syllabi, it became evident that 73% of our courses are listing general education learning objectives. We will continue to work to include these objective on all of the syllabi.

Next Steps:

- Open review Participation and Town Hall Meetings - The Department's digital media team has worked to improve communication methods and outreach to students and faculty using digital displays and social media postings with graphic design consistency. Below is a list of suggestions for improvement:

  General #1: Final Reviews – Continue to improve on getting the faculty to submit their final reviews and list of jurors. Promoting student final projects online along with visiting critics profiles draws attention to the quality of projects and caliber of reviewers.

  General #2 Town Halls – Improve methods for students to submit questions and comments in advance of the meetings. Enabling student leaders to present student issues and events helps attract.

PC.8 Social Equity and Inclusion—How the program furthers and deepens students' understanding of diverse cultural and social contexts and helps them translate that understanding into built environments that equitably support and include people of different backgrounds, resources, and abilities.

Program Response:

The Department of Architectural Technology deepens students' understanding of diverse cultural and social contexts by engaging external industry representatives and community stakeholders in the design studios. To translate that understanding into built environments that equitably support and include people of different backgrounds, resources, and abilities, students research and present their cultural backgrounds, experiences and perspectives facilitating their development of unique design approaches and camaraderie with their peers. The activities and assessments are collected and reviewed on an annual basis by the course coordinators and then a broad overview conducted periodically by the super jury process.

Activity Descriptions:

PROGRAM CRITERIA OBJECTIVE 01: How the program deepens students' understanding of diverse cultural and social contexts.

1. **ARCH 1121-HISTORY OF ARCHITECTURE TO 1900**

   This historical survey of architecture covers the period from early civilizations to the arrival of the Industrial Revolution. Architecture is understood as an expression of the culture and life of a society, and each class session considers architectures from around the world within their social, historical, and spatial contexts. While the history of Western architecture is covered from the Egyptian to the Enlightenment, a special focus is directed to the architectures of the Far East, South Asia, Africa, pre- Columbian Latin America, the Islamic World, and elsewhere to provide a comprehensive overview

of the richness and diversity of architecture as a cultural artifact.

- Assessment Measure: Research paper about a selected building which measures a student's ability to describe and contextualize its diverse cultural and social context.
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Assignment

2. ARCH 3522_HISTORY OF NEW YORK ARCHITECTURE

From its founding in 1624, New York City has welcomed diverse groups of people. While exploring the development of the city's architecture and infrastructure, the trials and contributions of diverse immigrant groups are studied. This course includes discussions of the effect of social, cultural, political, and economic factors on architecture.

- Assessment Measure: Research paper addresses the social context of New York City's morphology and measures a student's ability to describe and contextualize diverse cultural and social contexts contributing to the urban built environment.
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Assignment

PROGRAM CRITERIA OBJECTIVE 02: How the program translates student understanding of diverse cultural and social contexts into built environments that equitably support and include people of different backgrounds, resources, and abilities

1. ULI WORKSHOP "URBAN PLAN" IN ARCH 4712_DESIGN VII_URBAN DESIGN

The design studio is dependent on active listening skills and informed responses to create a space for testing ideas and developing vision. The URBAN PLAN workshop and planning exercise is a tool utilized to provide students with metric-based insights of challenges facing local communities and development groups. This development simulation gives students a firsthand opportunity to consider community perspectives against financial and social directives.

- Assessment Measure: Assignment rubric evaluating development proposals and participation in Urban Plan Review
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Student Work

2. ARCH 2312_ARCHITECTURAL DESIGN III

In this design studio students choose a social, economic, environmental, or political topic of interest. They then design both a place to protest and a community center where the public, can advocate for, and learn more about the topic.

- Assessment Measure: Final project rubric demonstrating an understanding of social contexts
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Lecture, Assignment, Student Work

3. ARCH 2412_ARCHITECTURAL DESIGN IV

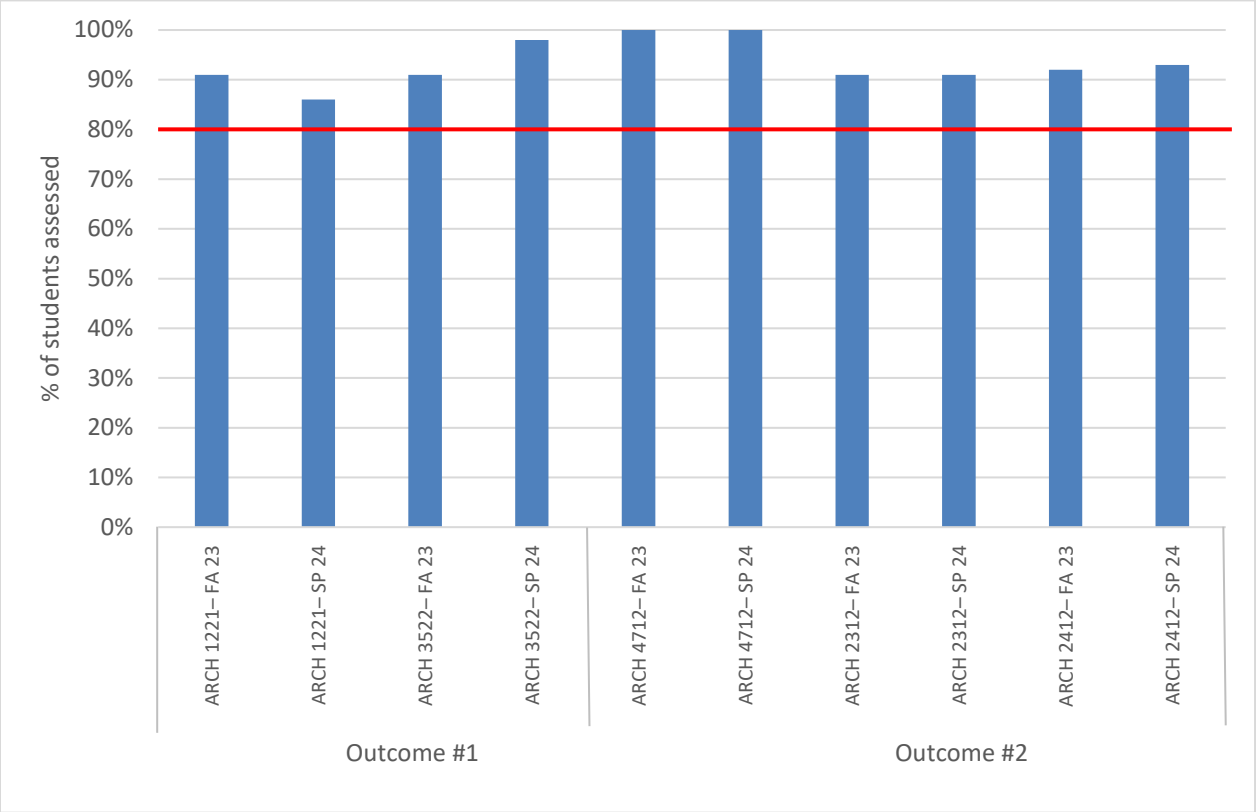
In this design studio students choose a cultural topic to research and explore and design a museum influenced by, and dedicated to, this culture.

- Assessment Measure: Final project rubric demonstrating an understanding of cultural contexts
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)

- Evidence: Assignment, Student Work

PC.8 Assessment Cycle: Every 3 years at the end of the academic year

PC.8 Assessment Summary:



For 2023-2024 all outcomes met or exceeded the 80% benchmark objective. The assessment results reveal that students met the expected benchmarks. Research and discussion of social equity and inclusion are of significance to the students in the department. The room for improvement was found in increasing their synthesis of history, current events. and advancing their ability to communicate this through increasingly sophisticated visual methods

For more detailed information please see: PC.8 Social Equity and Inclusion

Improvement Plan

The B. Arch program directors and course coordinators for the assessed courses met and discussed the assessment results and strategies to improve the outcomes.
Below are plans for improvement that would support the program criteria and the assessed assignments:

General #1: In-person attendance of exhibits and lectures. There is currently a very positive opportunity for students in the department to participate in a number of events hosted by the Architectural League of New York, NOMAs and AIAs. These enable student to have exposure to the language and application of ideas on equity. By encouraging attendance, the department simultaneously promotes inclusivity.

General #2: Develop a network for students to make field visits to areas of the city in greatest need to develop an “aesthetic of responsibility”. This may include visits to food pantries, homeless shelters, and public psychiatric facilities.

General #3: Encourage a wider use of GIS mapping tools. These applications enable students to quickly visualize data to get an understanding of urban environmental justice issues.

General #4: Curricular and non-curricular activities related to social equity and inclusion are dispersed throughout our program. We would like to find create a spine that ties the various activities together.

ARCH 4712- Design VII: The integration of ULI Inspired Workshop “Urban Plan” will continue to be refined during t 2024-2025 academic year.

ARCH 2412- Design IV: During the spring 2024 readings related to this criterion were introduced as part of the course curriculum. Currently, the number readings are being increased and the course schedule has been revised to include a series of discussion session where students critically exchange ideas.

3.2 Student Criteria (SC): Student Learning Objectives and Outcomes

A program must demonstrate how it addresses the following criteria through program curricula and other experiences, with an emphasis on the articulation of learning objectives and assessment.

SC.1 Health, Safety and Welfare in the Built Environment—How the program ensures that students understand the impact of the built environment on human health, safety, and welfare at multiple scales, from buildings to cities.

Program Response:

The Department of Architectural Technology at City Tech has developed its curriculum to include an understanding of the impact of the built environment on human health, safety, and welfare at multiple scales, from buildings to cities. The sequence of studio courses investigates projects ranging from small to urban scale. Human health, safety, and welfare are discussed and integrated in all upper-level studios.

ARCH 3612_Architectural Design VI culminates the studio sequence's efforts to incorporate health, safety, and welfare requirements at the scale of the building and site design. The students are asked to consider the following aspects of the design process:

1. Understand accessible design as an integrated part of the design project.
2. Apply regulations supporting health, safety, and welfare, such as light and air calculation, in the design outcome of the housing project.

ARCH12_Architectural Design VII- Urban Design focuses on synthesizing this criterion and actively incorporates previous studio and lecture coursework to tie together topics of urban planning, architectural design, environmental sustainability, health, safety regulations and historic preservation. Architectural Design VII unpacks the urban design process and introduces students to methods and strategies to design healthy and smart cities. It explores both the theoretical and pragmatic aspects involved in this process. The semester-long project concentrates on the design of a large urban development and community enhancements. Student tasks include developing a building and land use program, public space design, building massing, and community engagement areas. As a starting point for structuring and constraining their own design process, students conduct case study research on mixed-use projects and examine historical precedents from a

curated list. Students are required to develop solutions which specifically address issues of urban public health, wellness, sustainability, and resiliency. In this process, the following six goals are used as parameters for the design development of the project:

1. Create and reinforce a sense of place and character for the neighborhood.
2. Ensure that all proposed public spaces are accessible and enjoyable for all.
3. Design with care and pay attention to details at every scale.
4. Ensure that the public realm is comfortable and feels safe.
5. Understand how governmental regulations and building codes are used to ensure the health, safety, and social welfare of the neighborhood.
6. Address the impacts of climate change and incorporate resilient design.

The school is working with the Urban Land Institute (https://newyork.uli.org/get-involved/urbanplan/) and has integrated a formal workshop in the urban design course curriculum, which simulates many of the tasks associated with our five assessed measures. The workshop is a formal simulation of an urban design project moving through the stages of the urban design process from demographic neighborhood review and land-use to the development of master plans. The students meet and make presentations to outside professionals who review the students' work and act as teachers and critics of the process.

- "ULI's Urban Plan is a 15-hour project-based learning curriculum developed for universities - engaging both undergraduate and graduate students. Over the course of the Urban Plan unit, students take on roles and form teams to respond to a Request for Proposals for a fictitious 11.75 acre site which consists of vacant land and several existing buildings." Urban Land Institute
- Students must reconcile the often-competing agendas and consider tradeoffs by consideration of building height and density, land use adjacencies, convenience to transportation, and alternate modes of transportation to create a well-designed, market-responsive, and sustainable project.
- "Each team creates a financial pro forma and a physical model of their plan and presents their proposal to a mock City Council that awards the development contract to the winning team. Urban Plan is supported by trained ULI volunteers who are professionals in all disciplines of land use and development, who are selected for their depth of experience and knowledge. " Urban Land Institute

Through this process students develop a broad understanding of the impact architectural design has on human health, safety, and welfare and allows them to imagine how the built environment can contribute to the way we experience buildings and cities. Below are descriptions of each activity and its assessment.

Activity Descriptions:

STUDENT CRITERIA OBJECTIVE 01: How the program ensures that students understand the impact of the built environment on human health, safety, and welfare at the scale of a city or neighborhood.

1. **ARCH 4712_DESIGN VII: URBAN DEMOGRAPHIC STUDY**

   Students conduct an urban demographic study to understand demographics and its impact on design decisions. This includes proposing appropriate program uses and adjacencies that add to the livelihood of the existing communities and addressing building height and density. Students reuse existing buildings where possible since these often add value and

familiarity to the community. The assignment deliverables include a narrative, a statistical data collection and analysis, and a photographic study. The data collection and analysis may include but is not limited to the following categories:

- Income
- Education
- Marital Status
- Employment
- Home Ownership
- Public health/Safety
- Infrastructure: transportation, energy, water /waste management
- Geographical location/ land use
- Assessment Measure: Urban Demographic Study: Assignment rubric assessing understanding of demographics and its impact on design decisions
- Benchmark Objective: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Student Work

2. **ARCH 4712_DESIGN VII: LAND USE PLAN**

   Students engage in a land use planning exercise that considers the interests of stakeholders such as residents, landowners, developers, municipalities, and other professionals. The assignment deliverables include a narrative and land use plan for the site. The proposals must incorporate a list of land use components conforming to the governing regulations, and simultaneously, meets the goals of a sustainable mix use community.

   - Assessment Measure: Assignment rubric assessing an understanding of land use plans and regulatory context and their impact on design decisions
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Student Work

3. **ARCH 4712_DESIGN VII: MASTER PLANNING REPORT**

   Students develop a long-term planning document that provides a conceptual layout to guide future growth and development. The master plan should demonstrate outcomes that have a positive impact on the built environment. Additionally, the proposal must consider human health, safety, and welfare at multiple scales. Assignment deliverables include an Urban Design Report and Master Plan proposal.

   - Assessment Measure: Assignment rubric assessing student's ability to integrate human health, safety, and welfare into large-scale masterplan
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Student Work

STUDENT CRITERIA OBJECTIVE 02: How the program ensures that students understand the impact of the built environment on human health, safety, and welfare at the scale of a building.

1. **ARCH 4612_DESIGN VI: DEVELOPMENT OF ARCHITECTURAL SOLUTIONS**

   Architectural Design VI reinforces the fundamentals of accessible design to the students through the development of an ADA one-bedroom apartment along with an accessible route from the sidewalk to the entrance of the housing complex, to the ADA elevator to the

ADA apartment. Through a short lecture and discussion module, the class is introduced to design of an accessible bathroom, mailboxes, hallways, kitchen, laundry and doors. Students then produce the ADA route and an ADA one bedroom apartment.

- Assessment Measure: Students present their ground floor/site plan along with their ADA apartment – noting the accessible route.
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Student Work

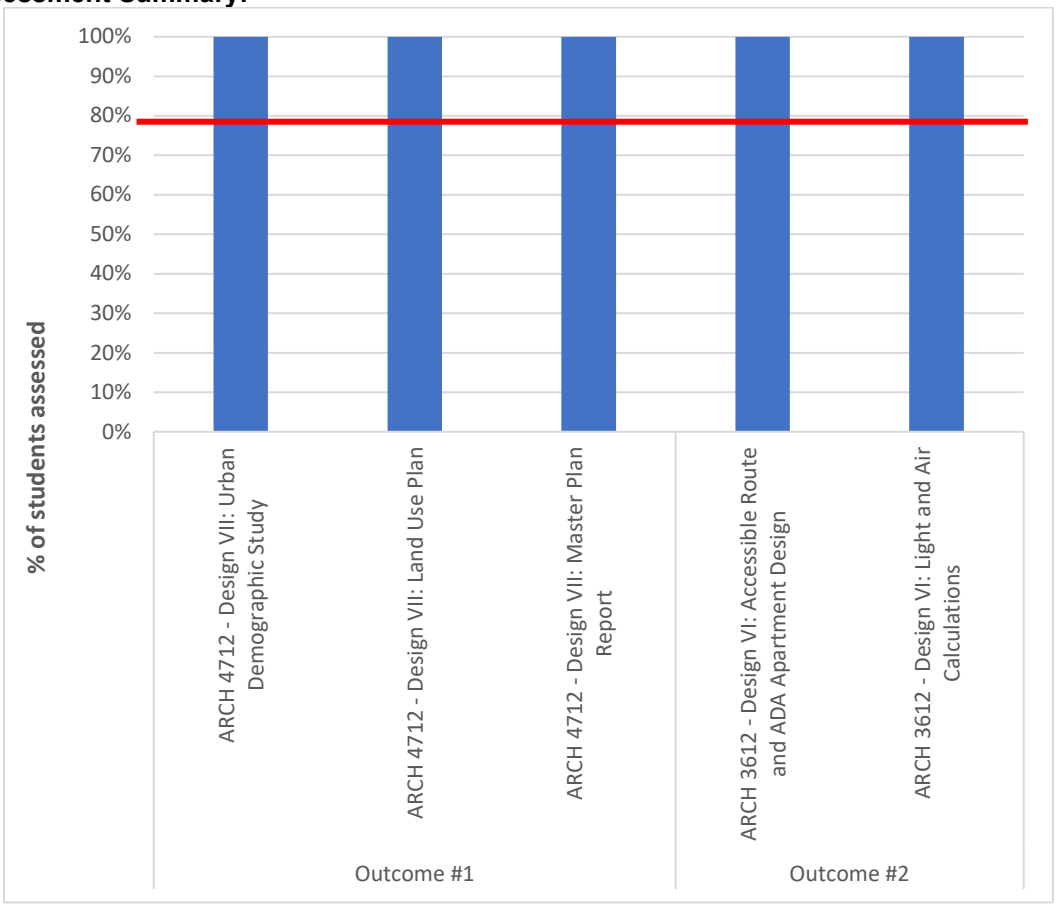
2. **ARCH 4612_DESIGN VI: LIGHT AND AIR CALCULATION**

Students investigate and document the NYC Building Code for light and air requirements for habitable spaces required in the apartments.

- Assessment Measure: Typical Apartment Plans: Verification that the students have included accurate light and air based on the area of each habitable room.
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Assignments, Examples of Student Work, and Lectures

Assessment Cycle: Every 3 years at the end of the academic year

Assessment Summary:



For 2023-2024 all outcomes met or exceeded the 80% benchmark objective.
For more detailed information please see: SC.1 Health, Safety and Welfare in the Built Environment.

Improvement Plan:

ARCH 3612 Design VI is a challenging course that is the culmination of the BTech sequence and includes many topics that need to be covered while allowing students to complete a substantial design project. After the last accreditation cycle, the course coordinator met with the faculty teaching the course and reviewed the assessment results to incorporate more elements addressing health, safety, and welfare aspects of the design. We now spend more time reinforcing the assessed assignments. Egress Diagrams – students reviewed codes and proved that their dead ends and travel distances met the building codes. Light and Air requirements were added to the course during this cycle. Student were required to perform the calculations to demonstrate that their apartments had the correct area of glazing and operable windows. There was much improvement throughout the semesters with these updates.

In ARCH 4712 Design VII: Urban Design Studio students are taught that the built environment reflects the social, political, and economic structures of our society. Students learn how they can shape the urban environment using their design skills and the laws and codes of government to positively impact the human health, safety, and welfare at multiple scales, from buildings to cities. The Urban Land Institute (https://newyork.uli.org/get-involved/urbanplan/) – Urban Plan Module is implemented at the beginning of the semester to provide students with a broad understanding of the issues urban designers face when intervening at a neighborhood-urban scale before beginning their projects.

We provide additional technical tools and training in software to better support our students ability to assemble and create demographic surveys and land-use diagrams which help them assess the social, economic, and political character of their project sites and identifies issues and conditions which evolve into goals and outcomes for their design projects. We have incorporated a 10-session workshop in the use of ARCGIS. ARC Geographic Information System (GIS Software) is designed to store, retrieve, manage, display, and analyze all types of geographic and spatial data. GIS software will help students produce maps and other graphic displays of geographic information for analysis and presentation. Utilizing the skills developed in workshops taught by adjunct faculty, will further student understanding of demographics, existing site conditions, and graphic representation.

We reinforce the matters of health, safety, and welfare in their individual projects by having students carefully consider and further strengthen their understanding of urban design and its impact on social, political, and economic systems.The school plans to introduce students to stakeholders associated with the process. We plan to arrange for studios to visit public agencies, professional organizations, and real estate partners to study examples of urban design in NYC. The class will conduct formal field trips to areas in New York City to study real life case studies and examples of master plans and architectural solutions. This experience will be coordinated with modules in ARCH 1221- History of World Architecture to 1900 and ARCH 3522- History of NYC Architecture New York City.

These changes will be formulated in the 2024-2025 academic year.

SC.2 Professional Practice—How the program ensures that students understand professional ethics, the regulatory requirements, the fundamental business processes relevant to architecture practice in the United States, and the forces influencing change in these subjects.

Program Response:

The professional practice criterion is met in ARCH 4861- Professional Practice. This course is designed to help students develop an understanding of the ethics and responsibilities of a practicing architect and an understanding of the steps towards licensure. An overview of basic business

practices and contracts is discussed in the context of everyday office situations. There is an emphasis on researching established firms and their projects.

Activity Descriptions:

STUDENT CRITERIA OBJECTIVE 01: How the program ensures an understanding of the ethical issues involved in the exercise of professional judgment in architectural design and practice, the role of the AIA Code of Ethics in defining professional conduct, and the responsibilities of the architect to reconcile the needs of diverse stakeholders.

1. **DISCUSSIONS AND WRITTEN REFLECTIONS**

   Typical situations faced by the architect are discussed with the entire class and small groups and students are required to write individual reflections.

   - Assessment Measure: Assignment rubrics demonstrating understanding the role and responsibilities of an architect through a reflection essay and case study response based on the research of historical architectural crisis
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Assignment

STUDENT CRITERIA OBJECTIVE 02: How the program ensures an understanding of the architect's responsibility to the public and the client as determined by regulations and legal considerations involving the practice of architecture and professional service contracts.

1. **EXAM 1: PROFESSIONAL DEVELOPMENTS**

   Evaluate understanding of professional developments including licensure requirements through selected questions on the exam

   - Assessment Measure: Exam outcome demonstrating understanding of procedure and specifics of professional developments including steps toward licensure
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Exams

2. **EXAM 2: PROFESSIONAL SERVICE CONTRACTS**

   Evaluate understanding of professional service contracts through selected questions on the exam

   - Assessment Measure: Exam outcome demonstrating understanding of different types of professional service contracts
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Exams

3. **EXAM 3: BUSINESS PRACTICES**

   Evaluate understanding of business practices through selected questions on the exam

   - Assessment Measure: Exam outcome demonstrating understanding of different types of business practices
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Exams

PROGRAM CRITERIA OBJECTIVE 03: How the program ensures an understanding of the basic principles of business practices within the firm, including project management, financial

management and business planning, marketing, business planning, marketing, business organization, and entrepreneurialism

1. **BUSINESS PLAN & PROJECT PROPOSAL PRESENTATION**

   Working together as a group, students develop a business plan that reflects lessons learned through the curriculum and apply to a project proposal for a potential client

   - Assessment Measure: Assignment rubrics demonstrating cooperative development of a business plan and a project proposal to a potential client working as a group
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Assignment

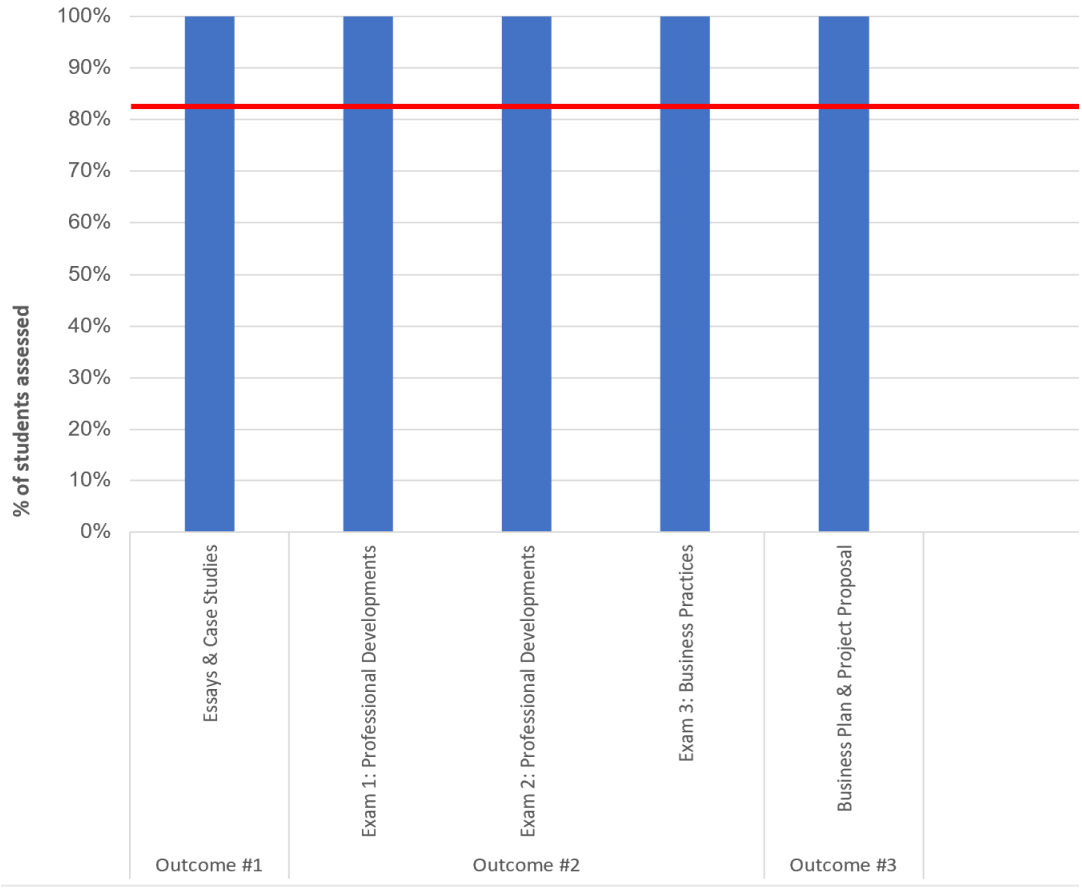
2. **PROFESSIONAL RESUME**

   Evaluate ability to prepare a professional resume responsive to firm needs and applicant's abilities and goals.

   - Assessment Measure: Assignment rubrics demonstrating competency of developing a professional resume
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Assignment

Assessment Cycle: Every 3 years at the end of the academic year

Assessment Summary:



All outcomes met or exceeded the 80% benchmark objective.
For more detailed information please see: SC.2 Professional Practice.

Improvement Plan:

With the retirement of Prof. Barbara Mishara, who served as the previous coordinator, ARCH 4861 went through a change of hands in coordination and faced the challenge of new teaching faculty. This led to a need to develop uniform assessment and documentation. The new course coordinator will make improvements to maintain consistency across all sections. A plan for implementing these changes will be formulated in the 2024-2025 academic year.

SC.3 Regulatory Context—How the program ensures that students understand the fundamental principles of life safety, land use, and current laws and regulations that apply to buildings and sites in the United States, and the evaluative process architects use to comply with those laws and regulations as part of a project.

Program Response:

The department strives to have a strong sequence of both design and building technology studios that promote creative problem solving while addressing user requirements, regulatory requirements, site conditions, and accessible design. The students research, analyze, evaluate, and generate solutions to these issues through design solutions and construction documentation. Projects typically use New York City as a canvas, encouraging students to understand the surrounding environments using building and zoning codes and regulations. Below are descriptions of each activity and their assessment:

Activity Descriptions:

STUDENT CRITERIA OBJECTIVE 01: How the program ensures that students understand the fundamental principles of life safety and accessibility through current laws and regulations that apply to buildings and sites in the United States, and the evaluative process architects use to comply with those laws and regulations as part of a project is addressed in the following courses:

1. **ARCH 3612_ ARCHITECTURAL DESIGN VI**

   Students demonstrate an understanding of travel distances and allowable dead end corridors and number of exits on a typical floorplan in a residential building by preparing an egress diagram for their final design project.

   - Assessment Measure: Egress Diagram: Verification that each student has included an egress diagram in their final presentation delineating the required egress and travel distances.
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Assignments, Examples of Student Work, and Lectures

2. **ARCH 3531_ BUILDING TECHNOLOGY IV**

   Through the design and documentation of a mid-rise building students must demonstrate a basic understanding of life safety and accessibility regulations.

   - Assessment Measure: Accessibility Diagrams and Life Safety Calculations: Assignment rubric demonstrating an understanding of the fundamental principles of life safety and accessibility regulations
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)

- Evidence: Assignments, Examples of Student Work, and Lectures

STUDENT CRITERIA OBJECTIVE 02: How the program ensures that students understand the fundamental principles of land use, and current laws and regulations that apply to buildings and sites in the United States, and the evaluative process architects use to comply with those laws and regulations as part of a project is addressed in the following courses:

1. **ARCH 3612_ ARCHITECTURAL DESIGN VI**

   Students investigate the zoning of the site and the allowable envelope through group site analysis

   - Assessment Measure: Zoning Analysis: Verification that students have included the correct zoning documentation specific to the site they are working on
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Assignments, Examples of Student Work, and Lectures

2. **ARCH 3612_ ARCHITECTURAL DESIGN VI**

   Students investigate and document the existing land use of the neighboring areas through group site analysis

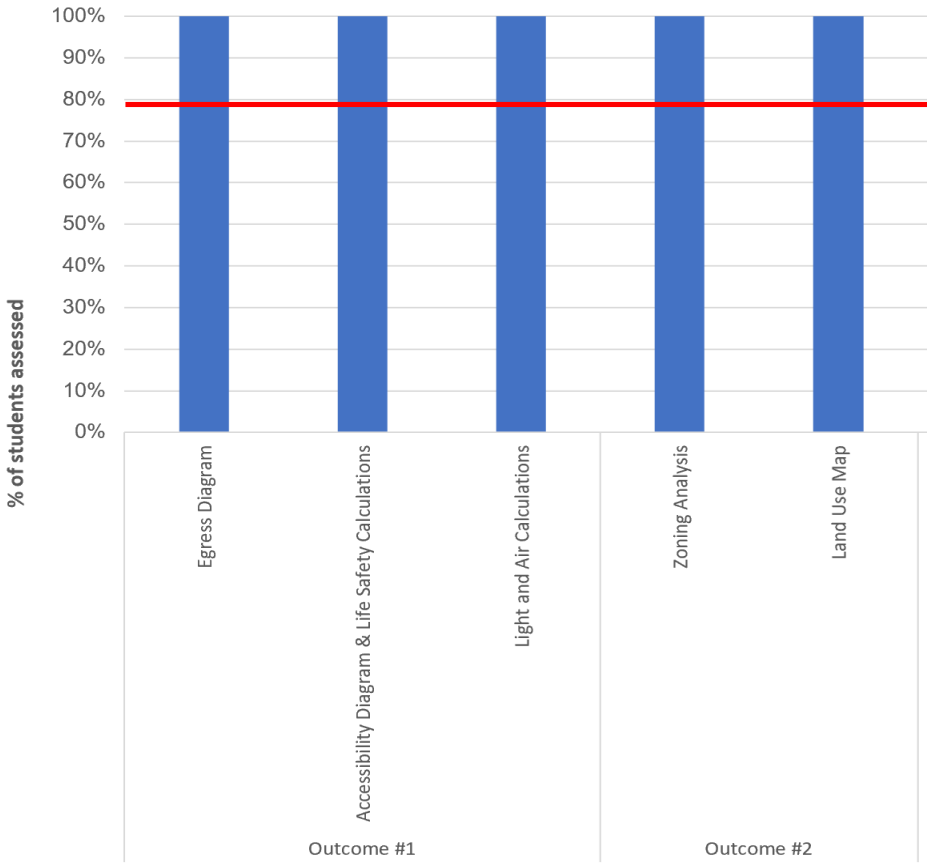
   - Assessment Measure: Land Use Map: Verification that the students have included accurate land use maps in their site analysis and the use of this information to plan their ground floor plan.
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Assignments, Examples of Student Work, and Lectures

3. **ARCH 3612_ ARCHITECTURAL DESIGN VI**

   Students investigate and document the NYC Building Code for light and air requirements for habitable spaces required in the apartments.
   - Assessment Measure: Typical Apartment Plans: Verification that the students have included accurate light and air based on the area of each habitable room.
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Assignments, Examples of Student Work, and Lectures

Assessment Cycle: Every 3 years at the end of the academic year

Assessment Summary:



For 2023-2024 all outcomes met or exceeded the 80% benchmark objective.
For more detailed information please see: SC.3 Regulatory Context.

Improvement Plan:

ARCH 3612: Architectural Design VI is a rigorous course that challenges students to integrate multiple design concepts and technical skills. Following the last accreditation cycle, the course coordinator and faculty members reviewed the assessment results and identified areas for improvement. It was decided that additional time would be dedicated to teaching fundamental life safety calculations, which are crucial for the assignments that are assessed. These revisions were planned during the 2022-2023 academic year and were implemented in the 2023-2024 cycle, resulting in marked improvements from the previous cycle.

Architectural Design VI covers a wide range of topics while allowing students to complete a substantial design project. After the last accreditation cycle, the course coordinator and faculty met to analyze the assessment results, leading to a greater emphasis on reinforcing key competencies through assessed assignments. For instance, students were required to create egress diagrams to demonstrate compliance with building codes checking dead ends and travel distances. Additionally, the topic of Light and Air Requirements was incorporated into the curriculum. Students were tasked with performing calculations to ensure their apartment designs had adequate glazing areas and operable windows, as specified by code.

Zoning was another critical area of focus. Students were not only expected to research and develop zoning envelopes for their sites but also to design their buildings within these constraints and demonstrate compliance visually. In the area of Land Use, students conducted fieldwork in teams,

compiling data on existing uses near their sites. This analysis helped them determine optimal ground-floor spaces and strategically locate building entrances and amenities. These updates to the curriculum led to significant improvements throughout the semester.

SC.4 Technical Knowledge—How the program ensures that students understand the established and emerging systems, technologies, and assemblies of building construction, and the methods and criteria architects use to assess those technologies against the design, economics, and performance objectives of projects.

Program Response:

The B. Arch curriculum at City Tech centers around exposing students to both the design and technical aspects of architecture. The building technology studios are at the core of our curriculum. Students are required to take four sequential building technology studios that each focus on a different building material and its associated systems, technologies, and assemblies. Each course reviews established systems and exposes students to emerging systems currently being researched or deployed in the profession. In each studio students are asked to study the characteristics of different building materials and assemblies, such as performance, economics, and aesthetics, and how these aspects affect decision-making in the design process. Students are then asked to apply their knowledge about the materials and assemblies being studied through the design and development of technical documents for buildings at various scales. Below are descriptions of each activity and their assessment:

Activity Descriptions:

STUDENT CRITERIA OBJECTIVE 01: How the program ensures that students understand the established systems and technologies and the methods and criteria architects use to assess those technologies against the economics and performance objectives of projects is addressed with the assignments below:

1. **ARCH 3531_ BUILDING TECHNOLOGY IV: STUDENT READING NOTES**

   Building Tech IV focuses on concrete construction, advanced glazing systems, and masonry and concrete cladding. Students then apply this knowledge in the design, development, and technical documentation of a mid-rise concrete framed structure. Students are presented with lectures and reading assignments that address the following:

   - The Design and Construction Process
   - The Properties of Concrete
   - Concrete Framing
   - Roofing
   - Glazing Assemblies
   - Properties of Exterior Walls
   - Cladding with Masonry and Concrete
   - Interior Finishes

   To demonstrate an understanding of these established systems, technologies, and assemblies used in the building construction students then take handwritten notes that are submitted for grading.

   - Assessment Measure: Assignment Rubrics demonstrating an understanding of established systems and technologies with a focus on concrete construction
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Assignment and Student Work

2. **ARCH 2331_BUILDING TECHNOLOGY II: PASSIVE HOUSE WALL SECTION**

   Building Technology II develops students' understanding of light wood frame construction, foundation design, and high performance building construction. Students then apply this technical knowledge to, development, and technical documentation of a single- or double-unit residential house. Students are expected to understand fundamentals of the passive house and detail the wall section reflecting its principle.

   - Assessment Measure: Final grade reflecting understanding of a typical passive house wall section on wood construction
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Assignment and Student Work

3. **ARCH 2431_ BUILDING TECHNOLOGY III: STEEL STAIR ASSEMBLY**

   Building Tech III focuses on steel construction, glass curtain wall and opaque façade systems. Students build their knowledge starting with small studies of structural steel frame construction, starting with demonstrating an understanding of established systems and technologies with a focus on the design and detailing of a 1-story steel stair for a residential project. Students produce a series of drawings using Revit software to demonstrate an understanding of detailing and assembly, with annotation and materials properly indicated. Research is integrated into the assignment.

   - Assessment Measure: Assignment Rubrics demonstrating an understanding of established systems and technologies with a focus on the design and detailing of a 1-story steel stair for a residential project
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Assignment and Student Work

4. **ARCH 2431_ BUILDING TECHNOLOGY III: STEEL CONNECTION ASSEMBLY**

   Students demonstrate an understanding of steel assembly and components by producing a series of drawings using Revit software. Required drawings demonstrate an understanding of steel assembly, with annotation and materials properly indicated. Research is integrated into the assignments.

   - Assessment Measure: Assignment Rubrics demonstrating an understanding of established systems and technologies with a focus on steel assembly for steel construction
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Assignment and Student Work

STUDENT CRITERIA OBJECTIVE 02: How the program ensures that students understand the established and emerging assemblies of building construction, and the methods and criteria architects use to assess those technologies against the design and performance objectives of projects is addressed with the assignments below:

1. **ARCH 1231_ BUILDING TECHNOLOGY I: MASONRY CAVITY WALL SECTION**

   Building Technology I is an introduction to basic materials of construction and the fundamental principles of orthographic projection and architectural drafting. The coursework includes documenting existing conditions, development of a plan, elevation, section, and assembly details supported by text-based study of material properties and applications. This course prepares students for further exploration of building technology, technical documentation, and understanding of structure, materials, and building

assemblies.

The technical drawing assignment focuses on the design of the exterior wall assembly for the case study building, utilizing masonry as the primary material. Each student develops a system for the exterior wall, documents it in two and three dimensions, and annotates its components to demonstrate their role in the assembly. The case study building context for the drawing assignment allows students to explore high performance issues within the laboratory of a 19th century load bearing masonry structure.

- Assessment Measure: Assignment rubric for the technical documentation of a masonry cavity wall section reflected through the final grade that includes the following proficiency
- Drawing Content: Met all required content regarding building elements, tags, notes, and dimensions.
    - Integration: Design, building assemblies, and building performance were assessed and integrated in the design solution.
    - Technical Documentation: Design, building assemblies, and building performance were accurately documented.
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Assignment and Student Work

2. ARCH 2331_ BUILDING TECHNOLOGY II: TECHNICAL DOCUMENTATION OF A PASSIVE HOUSE

In Building Technology II students apply their understanding of light wood frame construction and high-performance building assemblies, in the technical documentation of a one or two-unit residential building. The completed drawing set includes a high-performance wall section from roof ridge to foundation footing. The set includes illustrations of a case study project with a 3D wood framing model.

- Assessment Measure: Final grade reflecting the technical documentation of a passive house
    - Economical and Performance Design: Effective and efficient structural systems that support the design intent.
    - Emerging Systems, Technologies, and Assemblies: Evaluation of students' understanding of high-performance assemblies and building systems.
    - Technical Documentation: Design, building assemblies, and building performance were comprehensively and accurately documented.
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Assignment and Student Work

3. ARCH 2431_ BUILDING TECHNOLOGY III: CASE STUDY DRAWINGS

Building Tech III focuses on steel construction, glass curtain wall and opaque façade systems. Students build their knowledge starting with small studies of structural steel frame construction, then develop case studies of a small to medium size steel frame building that is documented through the drawings of a set of construction documents

- Assessment Measure: Assignment rubric for the technical documentation of a steel case study building
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Assignment and Student Work

4. ARCH 2431_ BUILDING TECHNOLOGY III: FAÇADE & MATERIAL STUDIES

Students are asked to develop details and visualize their understanding by drawing 4 related views of each condition, 1 plan, 2 elevations or sections, and 1 axonometric- all

with appropriate annotation. Components are modeled 3 dimensionally using BIM software and are presented both fully assembled and in various stages of assembly. Presented in a jury environment as part of a combined graphic and oral presentation, emphasis is placed upon the student's ability to demonstrate an understanding of the primary role of each component (structural, waterproofing, thermal, fireproofing), their assembly and the sequence of construction.

- Assessment Measure: Assignment rubric for the technical documentation of two façade & materials studies, one of a Rain Screen System and one Glass Curtainwall
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Assignment and Student Work

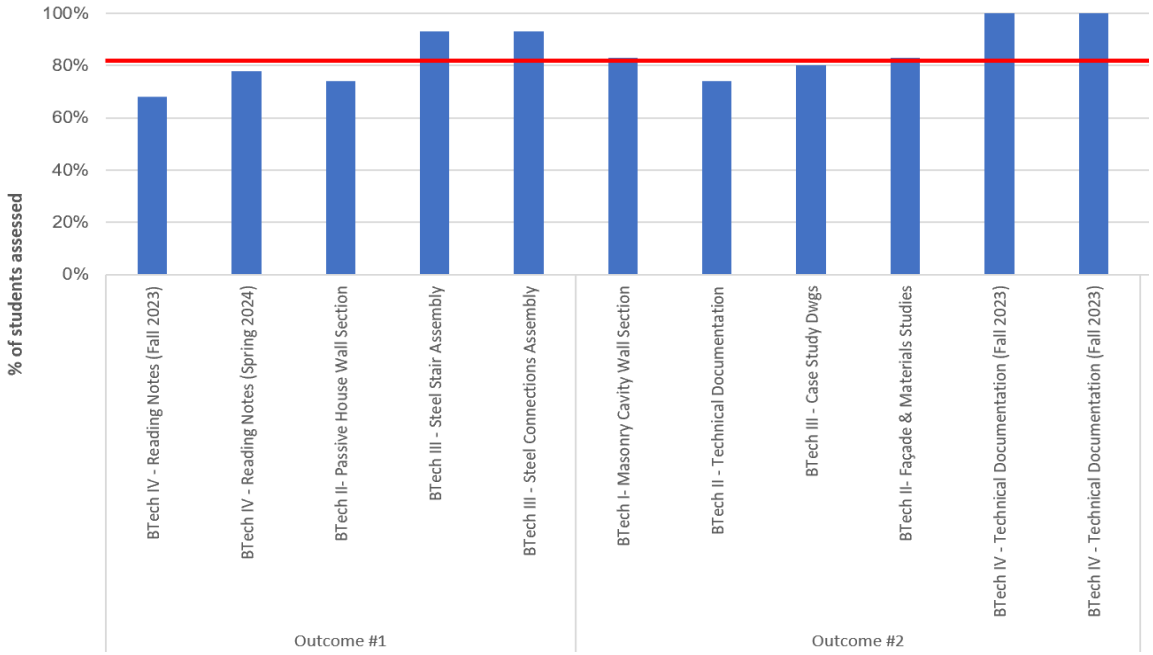
5. ARCH 3531_ BUILDING TECHNOLOGY IV: TECHNICAL DRAWINGS

In Building Technology IV students apply their understanding of established and emerging systems, technologies, and assemblies of building construction gained through lectures, readings, and research assignments, in the design and technical documentation of a mid-rise concrete-framed mixed-use building. Students use Revit and work in teams to produce technical documents for a building that must fulfill programmatic, structural, and basic code, zoning, regulatory, and building performance requirements while demonstrating a knowledge of select building assemblies.

- Assessment Measure: Assignment Rubric for the technical documentation of a mid-rise building
    - Drawing Content: Met all required content regarding building elements, tags, notes, and dimensions
    - Integration: Design, building assemblies, and building performance were assessed and integrated in the design solution
    - Technical Documentation: Design, building assemblies, and building performance were accurately documented
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Assignment and Student Work

Assessment Cycle: Every 3 years at the end of the academic year

Assessment Summary:



For 2023-2024 all outcomes met or exceeded the 80% benchmark objective, except for Building Tech II: Passive House Wall Section and Passive House Technical Documentation and sub-criterion of Building Tech IV: Notes. Notably in ARCH 3531 Building Tech IV – the new timelines of the Students Notes submission and in ARCH 2431 Building Tech III, the new timelines of the façade assignment submission and the addition of the new Steel Stair design and detailing as a first assignment. For more detailed information please see: SC.4 Technical Knowledge.

Improvement Plan:

In ARCH 1231 – Building Tech I, the Student Criteria for Technical Documentation (SC.4) assessment shows the students are meeting the current faculty expectations for this first technical course in the curriculum. Critical to taking the student performance to a higher level is the experiential learning of building assemblies at either construction sites or visiting specialized showrooms where systems and assemblies can be studied first-hand. To facilitate this, faculty across the department will share opportunities for student site visits to construction sites each semester while also compiling a list of showrooms of suppliers that are willing to offer students access with presentations and close up exposure to mockups of assemblies.

The additional course specific learning outcome for planimetric orthogonal drawing can be enhanced by improved exposure to best-practice examples and improved drafting facility in the studio labs. Faculty will collect classic examples of construction drawings for digital and hardcopy display in the studio lab for student reference but also inspiration for the quality and readability of drawings based on line weights and drawing conventions. The other course specific learning outcome is focused on student understanding and application of fundamental rules of thumb of structural principals. This outcome can be improved by implementation of simple lab experiments using common objects and materials where students can experience structural performance. Faculty will collaboratively develop a toolkit of materials and experiments that can be easily implemented in the studio lab to enhance the discussion of the principals as well as student curiosity and engagement.

In ARCH 2331 – Building Tech II, the challenge of a turnover of teaching professors has made coordinating and developing uniform assessment more challenging. The coordinator is developing

teaching aids, rubric explanations, videos, and additional support material to make assessment successful and uniform. Student reading notes is an area targeted for improvement. Reading notes are required to be submitted 4 times a semester. These notebook submittals have shown a variety of levels of development amongst the same students. To address this, additional note taking outlines and support material are under development. Use of computer drafting tools such as Rhino and AutoCAD still challenge students. Additional workshops and specific videos for assignments are being developed to support ARCH 2331 students in this area.

In ARCH 2431 – Building Tech III, students are introduced to Revit while developing an understanding of steel components and assembly. There are three primary assignment groupings, Studio Lab Assignments (Steel Stair and Steel Components Assembly), Façade Studies (Rain Screen and Glass Curtain Wall Studies), and a drawing set of a steel building. To improve student performance across the board, the department strategically organizes Revit workshops to support the assignments in this course.

As noted in the prior report, starting in the Spring of 2022, the sequence of assignments was modified to move the “Façade Studies” assignment forward to allow a better synergy with façade studies conducted in Design IV. A majority of our students are enrolled in Building Tech III and Design IV during the same semester. We have seen a benefit of this modification in both courses. Students in Design IV have shown improvement in the development of their façade systems and in Building Technology III, some students have specifically chosen façade systems that are appropriate to their design projects.

Since the last NAAB review and starting in the fall of 2023, two of the existing assignments have been modified. The first assignment titled “The Scavenger Hunt” has in the past been a warmup assignment and an introduction to Revit basics. This assignment has been modified to include the design and detailing of a 1-story steel stair for a residential building and it introduces 3D modeling with Revit families earlier in the semester. The assignment is now titled “Scavenger Hunt & Steel Stair” and has been added to the assessment. The earlier introduction of 3D modeling skills and concepts of steel assembly has been beneficial to the other assignments in the course. This can be noted by an improvement in student performance from 94% to 99% for the “Steel Connections” assignment which follows.

The second modification is to the façade studies. The “Solid Panel System” now focuses solely on Rain Screen Systems. We believe that the prevalence of Rain Screen systems in the practice of architecture makes this subject worthy of specialized focus.

In ARCH 3531- Building Tech IV, student reading notes are required to be submitted in advance of the corresponding lectures. Although not a problem in previous years, in the last accreditation cycle, just after the peak of the pandemic, many of the notes were submitted late. We suspect this was due to the switch to the online/ hybrid learning environment where the professors could not have as much one-on-one interaction with the students to enforce the timely submission of the notes. This cycle the timeliness has improved due to the stressed the importance of using the students’ notes as evidence in meeting the new NAAB criteria. The notes assignments did fall below our 80% benchmark and so the coordinator will continue to reinforce the importance of this assignment to both the faculty teaching the course and the students.
For all the building technology studios, as we return to fully in-person learning we will look to reintegrate past methods and make new additions as follows:

- A return to local field trips to buildings under construction and manufactures showrooms.
- A return to hands on review of manufacturer mockups of building systems and materials.
- The new integration 3D printed models into student assignments

A plan for implementing these changes will be formulated in the 2024-2025 academic year.

SC.5 Design Synthesis—How the program ensures that students develop the ability to make design decisions within architectural projects while demonstrating synthesis of user requirements, regulatory requirements, site conditions, and accessible design, and consideration of the measurable environmental impacts of their design decisions.

Program Response:

Our design studio sequence promotes creative problem solving addressing current urban and social issues. The students research, analyze, evaluate, and generate solutions for design problems, while incorporating building technology and sustainability. Our studio sequence over ten semesters teaches fundamental principles of design by studying a variety of building typologies, increasing in complexity and scale. Through varying methodologies, a design concept and conceptual form is explored and realized throughout the design sequence. Studio projects typically use New York City as a canvas, encouraging students to understand the surrounding environments, research historical context and precedents, and create social and economic impacts that envision the future. Below are descriptions of each activity and its assessment:

Activity Descriptions:

PROGRAM CRITERIA OBJECTIVE 01: How the program ensures that students understand precedents during the research portion of design studio exposing the students to different building typologies.

1. **ARCH 3612_ARCHITECTURAL DESIGN VI**

   Architectural Design VI requires students to explore, document and analyze precedents in architectural typologies related to the content of the course. Through a short lecture and discussion module, this class introduces the students to the many forms of documenting precedents. Students are regularly made aware of the connections between similar projects and research for their own.

   - Assessment Measure: Precedent Study: Students present their work to the class in a pin-up and midterm and final presentation and final submittal.
   - Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
   - Evidence: Student Work

PROGRAM CRITERIA OBJECTIVE 02: How the program ensures that students understand regulatory requirements, site conditions, and consideration of the measurable environmental impacts of their design decisions based on the specific site documentation and synthesis.

1. **ARCH 3612_ ARCHITECTURAL DESIGN VI**

   Architectural Design VI requires the students to explore, document and analyze the site selection for their semester-long project. Through a short lecture and discussion module, this class reinforces the students to the many forms of documenting a site. While taking advantage of the rich environment of New York City, local sites are typically used in our studio courses affording our students the opportunity to make extensive site visits. Students are regularly made aware of the connections between the site and development of their project. The site analysis is completed as a team, looking at history, environmental impacts, transportation, commerce, zoning, adjacencies, density, and other site-specific elements.

   - Assessment Measure: Site Analysis: Student groups present the synthesis of their site analysis and design solution in the form of a site strategy diagram during a pin-up, midterm, and final review. A final assignment documenting the environmental impacts

that they have incorporated into their final design.
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Student Work

2. **ARCH 3612_ ARCHITECTURAL DESIGN VI**

Architectural Design VI requires the students to create a step by step design process for their final presentation. This allows the students to see the various impacts that they are addressing and how they shape the project to the final edifice.

- Assessment Measure: Students present a final design process of their project during the final.
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Student Work

PROGRAM CRITERIA OBJECTIVE 03: How the program ensures that students understand the development of an architectural program in the design studio.

1. **ARCH 3612_ARCHITECTURAL DESIGN VI**

Architectural Design VI reinforces the fundamentals of an architectural program as it relates to the content of the course. Through a short lecture and discussion module, this class presents the use, need for and importance of an architectural program. Through a series of drawings and diagrams students document their understanding of the program for their project and synthesize this understanding into their design solutions.

- Assessment Measure: Program Study: Students develop and present their completed programming documentation during a pin-up, midterm, and final presentation.
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Student Work

PROGRAM CRITERIA OBJECTIVE 04: How the program ensures that students understand the idea of accessible design as integrated into their design project. Whereas other courses cover technical drawings, this design studio integrates materials and fixtures and their selection into the design.

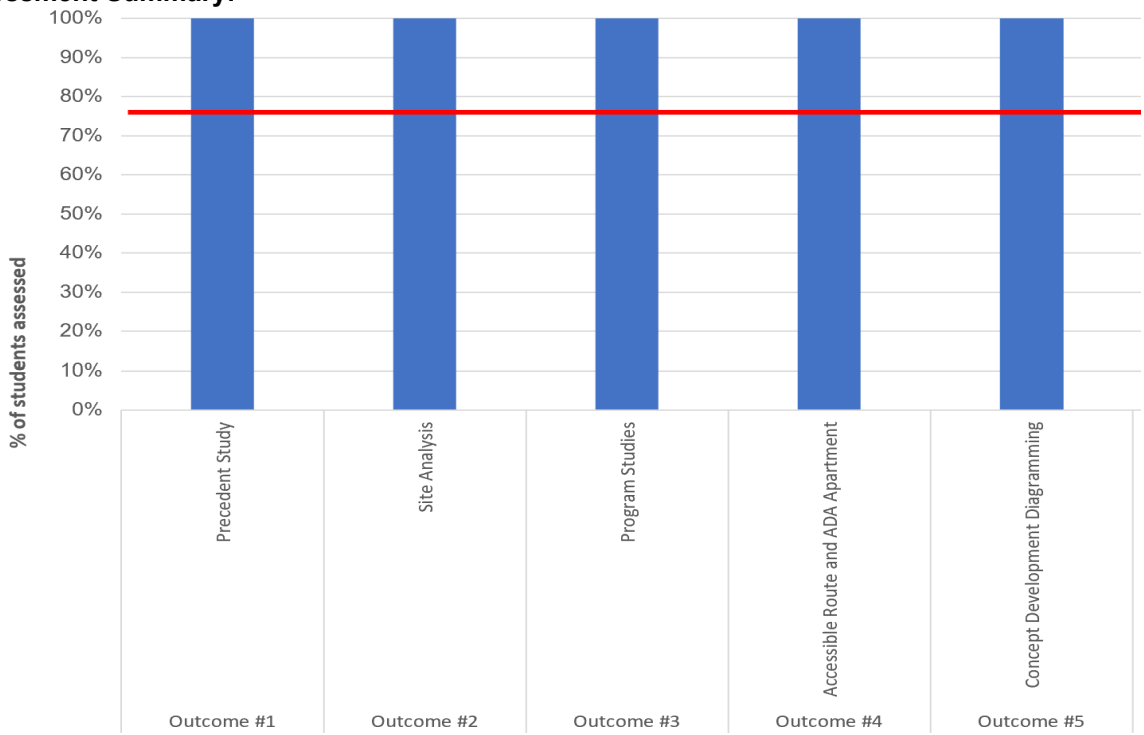
1. **ARCH 3612_ARCHITECTURAL DESIGN VI**

Architectural Design VI reinforces the fundamentals of accessible design to the students through the development of an ADA one bedroom apartment along with an accessible route from the sidewalk to the entrance of the housing complex, to the ADA elevator to the ADA apartment. Through a short lecture and discussion module, the class is introduced to design of an accessible bathroom, mailboxes, hallways, kitchen, laundry and doors. Students then produce the ADA route and an ADA one bedroom apartment.

- Assessment Measure: Students present their ground floor / site plan along with their ADA apartment – noting the accessible route.
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Student Work

Assessment Cycle: Every 3 years at the end of the academic year

Assessment Summary:



For 2023-2024 all outcomes met or exceeded the 80% benchmark objective.
For more detailed information please see: SC.5 Design Synthesis.

Improvement Plan:

Based on the comments that we received, many changes have been implemented. The major implementation was that all of the Outcomes for SC. 5 were integrated into ARCH 3612 – Design VI. Since this semester design studio is a one large project, it gave multiple areas to reinforce and develop these outcomes. A new one that was developed this last year was a Concept Design Diagram. This depicted the continuous development of the final project. The students were able to show the effects of site analysis, including, solar studies, zoning envelopes, their original concept, and building and ADA codes that governed the building and apartment layouts. These forces made the students aware of their design decisions and this exercise showed the students the shaping of their final project based on the impacts.

SC.6 Building Integration—How the program ensures that students develop the ability to make design decisions within architectural projects while demonstrating integration of building envelope systems and assemblies, structural systems, environmental control systems, life safety systems, and the measurable outcomes of building performance.

Program Response:

The Building Integration criterion is met in ARCH 4812 - Architectural Design VIII and supported by ARCH 4781 - Structures III. These courses build upon the knowledge and skills acquired in the core design sequence while integrating the topics of sustainability and building enclosure with performance evaluation. Students in the course are expected to incorporate their full knowledge of structural, mechanical, architectural, and technical expertise in the development of a building. Architectural Design VIII has been refined to meet the criterion, in which the assignments in the course have been developed to cover all aspects of the criterion and will be evaluated by using rubrics each semester.

ARCH 4812 – Architectural Design VIII has been refined for structural system, environmental control system (HVAC), and life systems. New materials were developed with lectures, workshops, and assignments, while adding the required drawings with specific criteria. To improve consistence, the requirements were shared across all sections of the course. In the following list of drawings, the underlined items are required drawings, and the criteria of each drawing can be found in the course notebook.

ARCH 4781 – Structures III builds upon the structural integration to include calculations, proper member sizing and connection detail design, and documentation of the process and design outcome through structural layout, 3d diagrams, sections, and details.

Activity Descriptions:

The criterion, SC.6 Building Integration, is sub-divided into six sub-criteria, each of which is defined in the following paragraphs. Each sub-criteria informs the course structure and/or the development of assignments. There is a certain degree of freedom for each instructor to emphasize certain aspects over others, depending on their expertise, but the core value of integrating all aspects is maintained in all section of the course.

A: Environmental Control Systems
ABILITY to select and apply building envelope systems relative to the fundamental performance of a building with the key drawings of sectional system diagrams and building elevations for 1) positively contributing to visual comfort with daylight, 2) selecting materials for sustainability, energy conservation, and thermal comfort, 3) providing the view for spatial and contextual needs.

B: Building Envelope Systems and Assemblies
ABILITY to select and apply building envelope systems relative to the fundamental performance of a building with the key drawings of sectional system diagrams and building elevations for 1) positively contributing to visual comfort with daylight, 2) selecting materials for sustainability, energy conservation, and thermal comfort, 3) providing the view for spatial and contextual needs.

C: Structural Systems
ABILITY to demonstrate the basic principles of structural systems and their ability to withstand gravity, seismic, and lateral forces in the framing plan with the key drawings of typical structural layout, structural 3D diagrams, and structural building sections for ensuring 1) the appropriate structural spans to meet spatial needs, 2) the structural continuity from each structural member to the foundations, 3) selecting the appropriate special conditions such as atrium and other long-span spaces, and 4) the expression of structural elements to meet the architectural concepts.

D: Life Safety Systems
ABILITY to accommodate accessibility and life safety requirements in the key drawings of 1) site circulation for pedestrian safety, 2) typical egress diagram for clear exit strategies with the travel distance allowed by the code, and 3) minimum two means of egress, 4) ground floor plan for exit to the outdoor, 5) the typical floor plan for accessibility provided via elevators and/or ramps.

E: Measurable Outcomes of Building Performance
ABILITY to analyze building performance without technical errors and integrate the outcome to influence the design decisions with passive design focus in key drawings of 1) massing radiation map for solar control on building surfaces and its microclimate, and 2) the whole building daylight simulation for appropriate lighting condition, and 3) massing wind simulation for resilience of the building and pedestrian microclimate. Wind simulation is optionally adopted at the instructor's discretion.

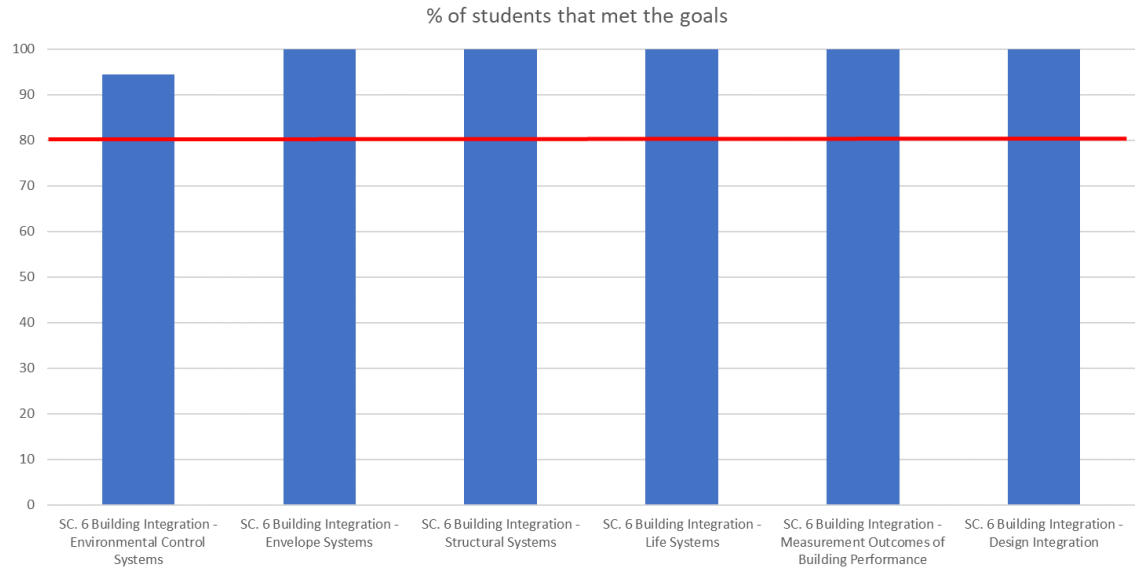
F: Integrative Design
ABILITY to integrate the research done throughout the semester to the design solution in key drawings of 1) manifesto for its clear guidance to the design solution, 2) design concept diagram for the clear manifestation process, 3) program area calculation for appropriate spatial needs and the local zoning, 4) site analyses for climate, environmental concerns and life safety needs, 5) architectural renderings and building elevations for showing the aesthetic consideration of the envelope systems and structural systems.

Assessment:

- Assessment Measure: Assignment rubric identifying each sub-criteria listed above.
- Benchmark: 80% of the students demonstrate proficiency (Grade C or better)
- Evidence: Student Work

Assessment Cycle: Every 2 years at the end of the academic year

Assessment Summary:



For 2023-2024 all outcomes exceeded the 80% benchmark objective.
For more detailed information please see: SC.6 Building Integration.

Improvement Plan:

In the prior assessment in 2021, we internally observed students struggled “Measurable Outcomes of Building Performance”, hence we introduced the tools and methods earlier in the coursework with clear goals, objectives, and deliverable in the assignments. The positive changes have been evident in the student work.

Responding to comments from the last NAAB visit in 2022, we refined the course work for structural system, environmental control system (HVAC), and life systems. New materials were developed with lectures, workshops, and assignments, while adding the required drawings with specific criteria. To improve consistency, the requirements were shared across all sections of the course. In the following list of drawings, the underlined items are required drawings, and the criteria of each drawing can be found in the course notebook.

Looking forward, we are planning to 1) reinforce the structural aspect, especially the facade elements and how they attach to the main structure, 2) expand the study on the carbon footprint and energy uses of the building, aligning the need of the industry, given NYC implemented the related law in the first time this year in its history.

4—Curricular Framework

This condition addresses the institution's regional accreditation and the program's degree nomenclature, credit-hour and curricular requirements, and the process used to evaluate student preparatory work.

4.1 Institutional Accreditation

The APR must include a copy of the most recent letter from the regional accrediting commission/agency regarding the institution's term of accreditation.

Program Response:

At its session on June 21, 2018, the Middle States Commission on Higher Education acted: To reaffirm accreditation and to commend the institution for the quality of self-study process and report. The next evaluation visit is scheduled for 2025 - 2026. See Appendix E for the most recent letter regarding City Tech's term of accreditation by the MSCHE dated June 22,2018

4.2 Professional Degrees and Curriculum

The NAAB accredits professional degree programs with the following titles: the Bachelor of Architecture (B. Arch.), the Master of Architecture (M. Arch.), and the Doctor of Architecture (D. Arch.). The curricular requirements for awarding these degrees must include professional studies, general studies, and optional studies.

4.2.1 Professional Studies. Courses with architectural content required of all students in the NAAB-accredited program are the core of a professional degree program that leads to licensure. Knowledge from these courses is used to satisfy Condition 3—Program and Student Criteria. The degree program has the flexibility to add additional professional studies courses to address its mission or institutional context. In its documentation, the program must clearly indicate which professional courses are required for all students.

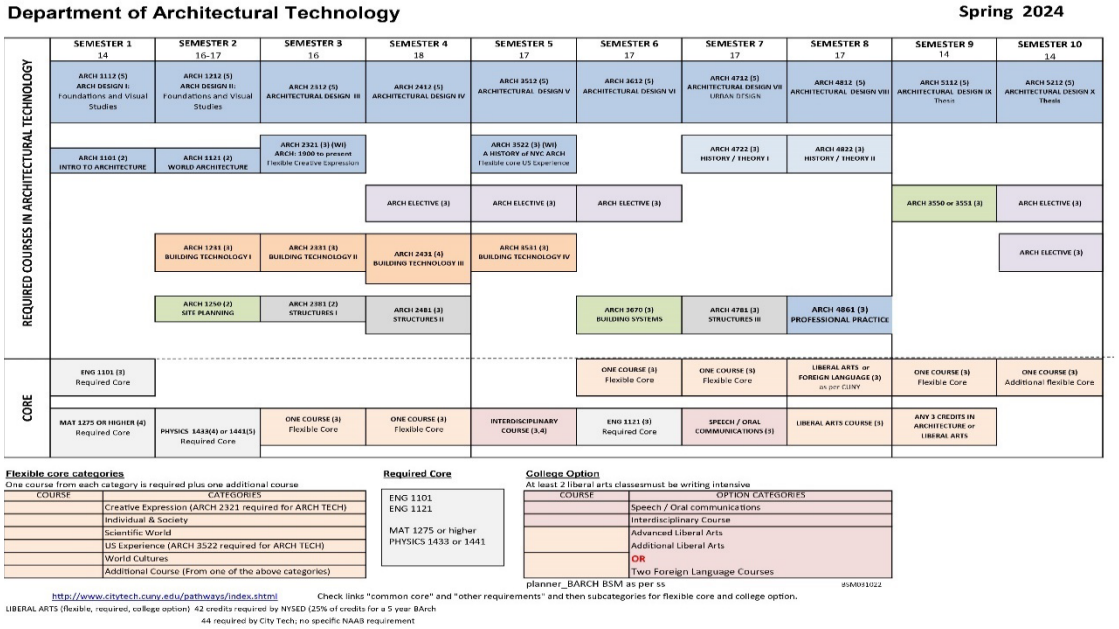
Programs must include a link to the documentation that contains professional courses are required for all students.

Program Response:

Our B. Arch degree program is built on the strong foundation of our B. Tech program. The B. Tech and B. Arch programs continue to complement each other, the former working towards a high level of technological expertise and the latter preparing graduates for leadership in design, technical proficiency, administration, and management. Of the 160 credits required to graduate, 113 credits must be in the architectural discipline. Of those 113 credits, 95 are required courses and 18are for architecture elective courses.

Below is a curriculum map showing all the required course for B. Arch students.

Course Planner for Bachelor of Architecture degree (BArch)



4.2.2 General Studies. An important component of architecture education, general studies provide basic knowledge and methodologies of the humanities, fine arts, mathematics, natural sciences, and social sciences. Programs must document how students earning an accredited degree achieve a broad, interdisciplinary understanding of human knowledge.

In most cases, the general studies requirement can be satisfied by the general education program of an institution's baccalaureate degree. Graduate programs must describe and document the criteria and process used to evaluate applicants' prior academic experience relative to this requirement. Programs accepting transfers from other institutions must document the criteria and process used to ensure that the general education requirement was covered at another institution.

Programs must state the minimum number of credits for general education required by their institution and the minimum number of credits for general education required by their institutional regional accreditor.

Program Response:

In its distinctive commitment to providing a strong general education in the liberal arts and sciences along with specialized technical training, City Tech requires 42 credits in liberal arts out of a total of 120 credits for a baccalaureate degree. Beyond the specific requirements of their degree programs, all City Tech students experience General Education Common Core that encompasses the knowledge, skills, and values determined by the faculty to be essential for success in every degree program. Grounded in the liberal arts and sciences, and integrated into every major, Gen Ed at City Tech inspires students to make connections across disciplinary lines and enriches their understanding of the moral, civic, and creative dimensions of life. It is the foundation for our hallmark technological and professional programs of study.

City Tech's General Education Common Core enables students to meet CUNY's Pathways requirements while also meeting the degree requirements of their programs.

Of the 160 credits required to graduate from the B. Arch program, 44 credits must fulfil general education requirements. Additional information on General Education at City Tech can be found here: http://www.citytech.cuny.edu/advisement/gen-ed.aspx

For transfer students, academic records are evaluated for transfer course equivalencies after a student has been admitted and has confirmed their intent to enroll at City Tech. With some limitations, students may be granted credit for courses completed at other accredited colleges and universities that offer courses comparable in credit and content to those offered at City Tech, provided satisfactory grades were received (i.e., “D” or better at any other CUNY unit; “C” or better at other institutions).

To earn an associate or baccalaureate degree at City Tech, students must complete a minimum of 30 credits in residence with 15 credits in the major department. The remaining credits needed to complete the degree may be transferred, provided they are approved for credit by City Tech.

Additional information on Transfer Credit Evaluation can be found here: https://www.citytech.cuny.edu/registrar/credit-evaluation.aspx

4.2.3 Optional Studies. All professional degree programs must provide sufficient flexibility in the curriculum to allow students to develop additional expertise, either by taking additional courses offered in other academic units or departments, or by taking courses offered within the department offering the accredited program but outside the required professional studies curriculum. These courses may be configured in a variety of curricular structures, including elective offerings, concentrations, certificate programs, and minors.

The program must describe what options they provide to students to pursue optional studies both within and outside of the Department of Architecture.

Program Response:

The B.Arch. curriculum integrates flexibility for optional studies by requiring 18 credits of architectural program electives and 18 credits of liberal arts and sciences electives. The credits allow students to enroll and apply credits toward minors such as the newly offered Business, Environmental Studies or Art History & Visual Culture Minors. B. Arch students may select architectural elective courses that align with specialty concentrations such as: Preservation Technology, Computation - Fabrication, Building Sciences, Sustainability & Resiliency, Project Delivery (Construction Mgmt.). The areas of concentration are calibrated to industry demand and specialized instruction is available at the college.

NAAB-accredited professional degree programs have the exclusive right to use the B. Arch., M. Arch., and/or D. Arch. titles, which are recognized by the public as accredited degrees and therefore may not be used by non-accredited programs.

Programs must list all degree programs, if any, offered in the same administrative unit as the accredited architecture degree program, especially pre-professional degrees in architecture and post-professional degrees.

Program Response:

In addition to the B. Arch degree, the Department of Architectural Technology offers the following degrees:

- Associate in Applied Science in Architectural Technology
- Bachelor of Technology in Architectural Technology

The number of credit hours for each degree is outlined below. All accredited programs must conform to minimum credit-hour requirements established by the institution's regional accreditor. Programs must provide accredited degree titles, including separate tracks.

4.2.4 Bachelor of Architecture. The B. Arch. degree consists of a minimum of 150 semester credit hours, or the quarter-hour equivalent, in academic coursework in general studies, professional studies, and optional studies, all of which are delivered or accounted for (either by transfer or articulation) by the institution that will grant the degree. Programs must document the required professional studies courses (course numbers, titles, and credits), the elective professional studies courses (course numbers, titles, and credits), the required number of credits for general studies and for optional studies, and the total number of credits for the degree.

Program Response:

Total Required Credits to earn B. Arch: 160

Course #	Course Title	Credits
Semester 01		Total 14 Credits
ARCH 1112	Architectural Design I- Foundations and Visual Studies	5
ARCH 1101	Introduction to Architecture	2
ENG 1101	English Composition I	3
MAT 1275	College Algebra and Trigonometry	4
Semester 02		Total 16 Credits
ARCH 1212	Architectural Design II- Foundations and Visual Studies	5
ARCH 1231	Building Technology I- Masonry	3
ARCH 1250	Site Planning	2
ARCH 1121	History of World Architecture to 1900	2
PHYS 1433	General Physics I- Algebra Based	4
Semester 03		Total 16 Credits
ARCH 2312	Architectural Design III	5
ARCH 2331	Building Technology II- Wood	3
ARCH 2381	Structures I	2
Flex Core	Flexible Common Core Course	3
ARCH 2321	History of Architecture- 1900 to the Present	3
Semester 04		Total 18 Credits
ARCH 2412	Architectural Design IV	5
ARCH 2431	Building Technology III- Steel	4
ARCH 2481	Structures II	3
ARCH xxxx	ARCH Elective	3
Flex Core	Flexible Common Core Course	3
Semester 05		Total 17 Credits
ENG 1121	English Composition II	3
ARCH xxxx	ARCH Elective	3
ARCH 3512	Architectural Design V	5
ARCH 3522	A History of New York City Architecture	3
ARCH 3531	Building Technology IV- Concrete	3

Semester 06		Total 17 Credits
ARCH 3612	Architectural Design VI	5
ARCH 3670	Building Systems	3
ARCH 3550 Or 3551	Building Performance Workshop Or Sustainability: History and Practice	3
Flex Core	Flexible Common Core Course	3
COM 1330	Public Speaking	3
Semester 07		Total 17 Credits
ARCH 4712	Architectural Design VII- Urban Design	5
ARCH 4722	Theory I- Principles and Theories of Architecture	3
ARCH 4781	Structures III- Structural Systems	3
Flex Core	Flexible Common Core Course	3
LibArt	Liberal Arts Elective	3
Semester 08		Total 17 Credits
ARCH 4812	Architectural Design VIII- Special Topics	5
ARCH 4822	Theory II- Architectural Theory Applied	3
ARCH 4861	Professional Practice	3
LibArt	Liberal Arts Elective	3
LibArt	Liberal Arts Elective	3
Semester 09		Total 14 Credits
ARCH 5112	Architectural Design IX- Thesis	5
ARCH xxxx	ARCH Elective	3
LibArt	Liberal Arts Elective	3
ID	Interdisciplinary Course	3
Semester 10		Total 14 Credits
ARCH 5212	Architectural Design X- Thesis	5
XXX xxxx	ARCH Elective	3
XXX xxxx LibArt	ARCH Elective Liberal Arts Elective	3 3

4.2.5 Master of Architecture. The M. Arch. degree consists of a minimum of 168 semester credit hours, or the quarter-hour equivalent, of combined undergraduate coursework and a minimum of 30 semester credits of graduate coursework. Programs must document the required professional studies classes (course numbers, titles, and credits), the elective professional studies classes (course numbers, titles, and credits), the required number of credits for general studies and for optional studies, and the total number of credits for both the undergraduate and graduate degrees.

Program Response:

Not applicable.

4.2.6 Doctor of Architecture. The D. Arch. degree consists of a minimum of 210 credits, or the quarter-hour equivalent, of combined undergraduate and graduate coursework. The D. Arch. requires a minimum of 90 graduate-level semester credit hours, or the graduate-level 135

quarter-hour equivalent, in academic coursework in professional studies and optional studies. Programs must document, for both undergraduate and graduate degrees, the required professional studies classes (course numbers, titles, and credits), the elective professional studies classes (course numbers, titles, and credits), the required number of credits for general studies and for optional studies, and the total number of credits for the degree.

Program Response:

Not applicable.

4.3 Evaluation of Preparatory Education

The NAAB recognizes that students transferring to an undergraduate accredited program or entering a graduate accredited program come from different types of programs and have different needs, aptitudes, and knowledge bases. In this condition, a program must demonstrate that it utilizes a thorough and equitable process to evaluate incoming students and that it documents the accreditation criteria it expects students to have met in their education experiences in non-accredited programs.

4.3.1 A program must document its process for evaluating a student's prior academic coursework related to satisfying NAAB accreditation criteria when it admits a student to the professional degree program.

See also Condition 6.5

Program Response:

Students are evaluated for admissions at the college level, which has established a minimum standard that all students entering into the Department of Architectural Technology must meet. All prospective students admitted into the department have the opportunity to submit additional requirements to apply for the B.Arch., which are posted on the program website: http://www.citytech.cuny.edu/architectural/architectural-B. Arch.aspx#.

Students transferring internally from the B. Tech Program to the B. ARCH program

The B.Tech. and B.Arch. curricula in the department have been designed to be the same for the first three years. B Tech Students in the department wishing to transfer to the B. Arch program apply as advanced- standing students and go through a rigorous and competitive application process during their third year at the college which includes a close review of their transcript and portfolio by the B. Arch Admissions Committee. The requirements for consideration for admission to the B.Arch. through advanced standing and a more detailed description are posted on the program website:
http://www.citytech.cuny.edu/architectural/architectural-B. Arch.aspx.

Students transferring externally to B. Arch program

External transfer students applying to the B. Arch program go through a rigorous transfer application process. To ensure that transfer students meet all the required NAAB criteria the department has stipulated that transfer applicants will not be granted transfer credits for ARCH 3512 Architectural Design V or ARCH 3531 Building Technology IV courses. Additionally, the rest of the NAAB criteria is met during the last two years of the program. For other courses, taken by transfer students outside of our college, a transfer credit evaluator will determine course equivalences and apply credit as warranted. Two full-time faculty members serve as transfer credit evaluators. Within CUNY most general education course equivalencies have already been evaluated and can be reviewed online within the CUNY system. Students transferring from other institutions who are accepted into the B. Arch program must provide copies of architecture,

architectural technology, or equivalent syllabi, course descriptions and writing samples or coursework for evaluation by the department's transfer credit evaluator.

In the Department of Architectural Technology, one full-time faculty member serves as a transfer credit evaluator. This faculty member has a comprehensive understanding of B. Arch courses and their learning objectives. After admission to the B. Arch program, transfer students have their transfer credits evaluated to determine course equivalencies. These students must provide copies of syllabi, course descriptions and writing samples or coursework for evaluation.

4.3.2 In the event a program relies on the preparatory education experience to ensure that admitted students have met certain accreditation criteria, the program must demonstrate it has established standards for ensuring these accreditation criteria are met and for determining whether any gaps exist**.**

Program Response:

Not applicable

4.3.3 A program must demonstrate that it has clearly articulated the evaluation of baccalaureate-degree or associate-degree content in the admissions process, and that a candidate understands the evaluation process and its implications for the length of a professional degree program before accepting an offer of admission.

Program Response:

Transfer student applications are carefully reviewed by the B. Arch Admissions Committee. Students transferring into the program should have completed the coursework necessary to effectively start the third year of the program. If a student does not meet the required criteria, they will be given the opportunity to enroll in the B. Tech program instead and apply again as an Advanced Standing Student once they meet the criteria.

Below is a list of required and recommended coursework for transfer students to have completed to be considered competitive during the selection process.

Required General Education Courses
English Composition 1101
College Algebra and Trigonometry
General Physics I: Algebra Based

Required Major Related Courses
Intro to Architecture
Design I Foundations and Visual Studies I
Design II Foundations and Visual Studies I
Design III
Design VI
Building Technology I
Building Technology II
Building Technology III

Recommended Major Related Courses
Site Planning
Architecture History to 1900
Architecture History to 1900 to Present
Structures I
Structures II
Arch Elective

Once a student has been admitted to the B. Arch program, they are required to meet with a dedicated department transfer credit evaluator to assess course equivalency for architecture courses. At this time students are asked to provide additional evidence such as course, syllabi, portfolio and/or sample tests or assignments.

Admission Guidelines can be found on the department's website.
https://www.citytech.cuny.edu/architectural/architectural-barch.aspx

5—Resources

5.1 Structure and Governance

The program must describe the administrative and governance processes that provide for organizational continuity, clarity, and fairness and allow for improvement and change.

5.1.1 Administrative Structure: Describe the administrative structure and identify key personnel in the program and school, college, and institution.

Program Response:

City Tech is one of seventeen senior colleges of the City University of New York. CUNY is governed by a Board of Trustees that approves the Bylaws, which are the highest source of policy within the University. A Chancellor oversees all of the CUNY colleges. Each college has a Foundation Board, President, Provost, Vice President(s), Dean(s), Chairperson(s) and Director(s) of specialized areas (such as Registrar, Counseling, Advisement, Institutional Research, Student Services, Transfer, Financial Aid and other student, faculty and multiple staff support. On May 1, 2019, Félix V. Matos Rodríguez took office as the eighth Chancellor of the City University of New York (CUNY). Dr. Matos Rodríguez, who had been the president of CUNY's Queens College since 2014, is a dedicated champion of accessibility, inclusion, and excellence in higher education.

Russell K. Hotzler, PhD, became the eighth president of New York City College of Technology in August 2004, bringing a wealth of experience in higher education and a deep commitment to enhancing academic opportunities. Dr. Hotzler has been part of the CUNY system for over 40 years and has served as CUNY Vice Chancellor for Academic Program Planning. He works with the Board of Trustees, Chancellor, Vice Presidents, Deans, Chairpersons, and other constituents to assure that the college fulfills its mission in all areas.

Pamela Brown, PhD, is the Provost and VP for Academic Affairs at New York City College of Technology of The City University of New York. Prior to this position, Dr. Brown served for eight years as associate provost and six years as dean of the School of Arts & Sciences. Dr. Brown has a track record of creating initiatives to improve the retention and recruitment of students interested in careers in STEM fields. As dean, she helped obtain and oversee five grants from the National Science Foundation (NSF).

The college comprises three academic schools: Arts and Sciences, Professional Studies, and Technology and Design. The Department of Architectural Technology is housed in the School of Technology and Design, which also contains the following departments: Advertising Design and Graphic Arts, Computer Engineering Technology, Computer Systems Technology, Construction Management and Civil/ Engineering Technology, Electrical and Telecommunications Engineering Technology, Entertainment Technology, Environmental Control Technology and Mechanical Engineering Technology. As of Fall 2024 the School of Technology and Design is led by Interim Dean Hong Li.

The day-to-day leadership of the Architectural Technology Department is the responsibility of the Chairperson. The Chairperson is elected by a majority of the full-time faculty in the

department for three-year terms. Sanjive Vaidya, RA served as interim chair of the Architectural Technology Department in the 2015-2016 academic year and has been chair since August 2016. Various responsibilities such as curriculum development and review, faculty searches, personnel and budget, accreditation, and other advisory roles are delegated to departmental committees.

The College Council implements the concept of shared governance for the college. Composed of faculty, staff, administrators, and students, the College Council is responsible for overseeing the curriculum of the College and formulating student-related procedures. In addition, the Council makes recommendations about budget, buildings and grounds infrastructure, personnel matters, and governance-related rules and regulations.

5.1.2 Governance: Describe the role of faculty, staff, and students in both program and institutional governance structures and how these structures relate to the governance structures of the academic unit and the institution.

Program Response:

Full-time faculty members meet twice a month to review and report work done in committees, including steering, facilities, appointments, admissions, accreditation, scholarship, and curriculum. Committee participants include adjunct faculty, willing to offer their experience and expertise, in these regular meetings. Faculty meeting agendas are circulated in advance and meeting minutes are reviewed and voted upon before being submitted for record. Frequent topics for discussion include technology resources, industry engagement and curricula modifications.

Adjunct faculty and students are surveyed for input and opinions about changes that may impact the program. Major modifications to course curricula are subject to discussion and a recorded vote by full-time faculty members, before being formally submitted to the College Council's standing curriculum committee for further review.

College Council membership reflects the various arms of the City Tech community. Faculty, instructional staff, and students are elected to serve on standing committees described in the City Tech Plan of Governance, thus ensuring that all groups on campus have a forum in which to be heard. All members of the City Tech community are invited to attend regularly scheduled Council meetings.

Upon approval by the curriculum committee, final curriculum submissions are presented at the College Council's general meeting for a vote. Approved curriculum changes are then sent to CUNY's Office of Academic Affairs where they are reviewed and voted on by CUNY's Board of Trustees. Pursuant to this process, the action is memorialized in the Chancellor's University Report (CUR).

Full time faculty, adjuncts and staff meet monthly to be apprised of developments and policies at the university, college, and department level. Adjunct faculty are offered opportunities to contribute and participate in these initiatives.

Town Hall meetings for all faculty and students create a forum for a broad-based discussion of existing and proposed programs, curriculum modifications and physical plant changes. Student leadership of the Architectural Club, NOMAS and AIAS report on the status of their organizations and upcoming events. Bringing the department together allows students to ask questions directly to the Department Chair, Program Directors, and faculty members. Student and faculty achievements are highlighted. Students can ask questions anonymously during the online meetings and provide useful feedback on the efficacy of the Town Halls. The nature of these meetings is respectful, and surveys indicate the meetings are "*useful and helpful*".

The Council of Academic Affairs, led by the Vice President for Academic Affairs, Interim Provost Pamela Brown, meets bi-monthly, to review strategies and tools to support faculty and advance student concerns. The Department Chair of Architectural Technology attends these meetings along with Professor Shelley Smith, Co-Director of the Center for Teaching Scholarship, Learning and Service also known as the Faculty Commons. These meetings enable interdisciplinary communication and implement programs that benefit students and faculty. This includes tools for student advisement and outreach, new student orientation programs, faculty assessment and opportunities to support research. The department chair and Professor Smith report back to faculty on relevant items discussed in this forum.

Chair Colloquium meetings, led by Interim Provost Pamela Brown, offers department chairs an opportunity to provide feedback to the Interim Provost on departmental management. This includes discussions on university and college policies, enrollment patterns and faculty assessment for re-appointment and promotion. Professor Shelley Smith, Co-Director of Faculty Commons, also attends these meetings as many Faculty Commons programs support the work of department chairs and faculty.

The college president's monthly Personnel and Budget Meetings (P&B) are attended by the Provost, Associate Provost and all department chairs. At this meeting the president provides a report on the college administration and budget and relays relevant information on college and university-wide initiatives or concerns. Ad-hoc committees present candidates for reappointment, tenure, promotion, and fellowship leave. The department chair reports back to the full-time faculty on issues pertaining to the Department of Architectural Technology.

5.2 Planning and Assessment

The program must demonstrate that it has a planning process for continuous improvement that identifies:

5.2.1 The program's multiyear strategic objectives, including the requirement to meet the NAAB Conditions, as part of the larger institutional strategic planning and assessment efforts.

Program Response:

The long-range planning objective in our department is founded on the commitment that our students have the necessary skills to satisfy the ever-changing demands of the profession. To ensure we are addressing long-term objectives the department has formed and tasked a steering committee to review and engage in periodic self-assessment and reflectance that measure relevance in the marketplace. In addition, the role of the steering committee has expanded to outreach and organization of fundraising for the advancement and support of the student body. This is accomplished through participation in course-coordination meetings, super-juries, town halls and targeted lectures and presentations to the entire faculty and students. The steering committee is responsible for crafting and implementing a unique vision for the long-term future of the department and setting a road map to achieve benchmarks along that path. The steering committee is nominated and confirmed by full-time faculty. Like all departmental committees, the committee chair reports back periodically to the full faculty on initiatives identified to advance and improve the program. The faculty meets twice each month. Department committees meet on days faculty meetings are not held. Committee chairs keep detailed meeting notes and are responsible for reporting progress and/or requests for assistance during faculty meetings. The department chair summarizes progress on long range planning, as it aligns with College and University initiatives, to the Dean via a Goals and Target Report submitted at the end of each academic year.

The advisory board has been reconceived as the "Executive Council in Design Education and Engagement." Members are solicited from a diverse array of the building industry's associated

fields and are tasked with building the profile and fundraising arm of the department, increasing experience, exposure, and employment opportunities for students. . Current members include a building industry attorney, a window manufacturing company, and an architect from a well-known practice. In 2024 we envision 2-3 additional members and to bring representation from the city government, urban planning and small business entrepreneurs.

As part of the department's fundraising and visibility efforts, the steering committee has partnered with the AIA Brooklyn Chapter to create a biennial event that connects industry leaders with the students and department . The first fundraising event highlighted student work, recent graduates, and advanced the departments fundamental goals of greater student visibility and engagement with the general public and the profession.

We have mechanisms in place to help us fulfill our current objectives and see the accreditation process as an opportunity to revisit our vision and refine long-term goals. We have identified several areas where we continue to advance our program:

- Enhancing a unique studio culture. Currently, most architecture students do not have dedicated facilities in which to do their work and must rely on limited home resources or the availability of space at school which is further restricted by increasing enrollment. Dedicated studio spaces were provided for the B. Arch thesis students since Spring 2022 and we continue to seek additional space to ensure that students have full accessibility to the resources of the department and to facilitate student interaction.

- We have developed a strong program in building technology and digital fabrication; however, we see a need to provide additional instruction in architectural theory, history, and, in response to the diversity of our students, the study of architecture cultures outside of the Western tradition. In Fall 2023 we hired Prof. Elena M'Bourourkounda who is researching late 19th and early 20th century Atlantic and Caribbean history with a focus on the French West Indies. She is developing the history sequence curriculum to include additional non-western perspectives and precedents increasing the relevance of this material to the students.

- We are fortunate to have invested in a Virtual Desktop Infrastructure (VDI) before the onset of the COVID crisis. At the start of the Pandemic in March 2020, we expanded our (VDI) to improve student access to digital tools while working remotely. Knowing that we planned to return to in-person teaching in the Spring of 2022, we began testing Apporto, a more robust and flexible platform VDI platform. Successfully tested in our graphic intensive and computational animation course, the department transitioned to the Apporto platform in the Fall of 2022. The VDI environment creates greater flexibility within classrooms and activates informal spaces while supporting online learning. Our VDI/Apporto environment is now managed centrally by the college CIS.

- Expand the Executive Council on Design Education and Engagement (Advisory Board) to include a diversified range of professionals representing institutional authorities, community interests, and public advocates, as well as technical and design professionals and entrepreneurs .

- Continue to improve our assessment methodologies.

- Develop and monitor the articulation agreements between NYC Career and Technical Education (CTE) high schools to bring their students into our AAS, B. Tech, and B. Arch programs. Establish similar articulation agreements with graduate schools to provide pathways to M. Arch degrees for our graduates.

- Establish our department as a community resource for neighborhood action to advance resilient, sustainable, and equitable communities through building, neighborhood assessment, planning, retrofitting, and analysis.

- Establish industry research and analyses facilities at the department to provide building component mock-up fabrication, testing, and simulations. Partner with manufacturers and industry to engage students with their plans to bring building products and systems to market.

- Conduct periodic “Super Jury” reviews that critically analyze the scope and relevance of the curriculum to the design profession that encompass work from all 5 years of the degree. Super Juries gauge work quality, competence level and utility to the marketplace. They serves as a component of assessment and engagement of external professionals and academics.

- Enhancing jury culture and mentorship. Design Jury culture at City Tech is expanding with outreach to design professional organizations, city agencies, manufacturers and community groups. In the past two years, the Architecture League of New York, The American Institute of Architects, PHI - Passive House Institute, ULI - Urban Land Institute, Enterprise Green Communities, NYCHA - New York City Housing Authority, NY Department of City Planning, MOCR - Mayor’s office of Climate Resilience, DOB -Department of Buildings, DDC - Department of Design and Construction, along with some of the most prestigious A&E firms in the city had jurors participating in the review of student work. The use of online learning platforms has increased the pool of international jurors, including architects, academics and allied professionals.. Leveraging digital tools in the design studio will enhance jury culture and the long term goals for external engagement and program visibility.
- We have spent the last year rearranging our curriculum and establishing a system of assessment to align with the 2020 NAAB Conditions. We are working towards streamlining this process so that it meets both NAAB’s and the college’s assessment requirements.

5.2.2 Key performance indicators used by the unit and the institution

Program Response:

To evaluate performance, the program currently relies on several documents including the Goals and Targets annual report produced by the Chair that encapsulates committee work across the department. The Goals and Targets report is submitted to the Dean for review and ultimately underpins procurement requests, evaluation criteria and timelines of department goals, from immediate need to long-term plans. In addition, the required NAAB criteria is essential to ensuring the B. Arch program has strong foundational goals to build upon. Meeting these criteria will be addressed in the Goals and Targets report. As the program unfolds there will be greater opportunities to pinpoint indicators for growth and alignment with the college and institution.

Key performance indicators will include:

- NAAB criteria
- Assessment report from AIRE (See 5.3.2 Assessment Liaison)
- Review of faculty performance aimed at teaching effectiveness (See 5.3.2)
- Department Goals and Targets annual report (See 5.3.2 Department Chair)

5.2.3 How well the program is progressing toward its mission and stated multiyear objectives.

Program Response:

Since the last NAAB visit in Fall 2022 the department has advanced on many fronts with several areas currently in development and others yet to be realized. Despite the pandemic which limited access to facilities, redirected operational budgets away from the department, and triggered a number of faculty retirements, the remaining full-time faculty rose to the challenges of an increased academic and department management workload. The recent addition of two new faculty members resulted in an opportunity to enhance the diversity and perspectives of our faculty.

The department has met the goal of creating new faculty office spaces on the 8th floor bringing the full-time faculty together for the first time. The new offices provide a single destination and promote greater interaction between students and adjunct faculty. In this space, computer stations are provided adjunct faculty.

The program goals are remain student-centric and focus on the following:

- degree completion
- career success
- knowledge creation
- new industry partnerships

Program dedicated studio space
The department has provided dedicated space for the first three cohorts of thesis students (2022–2024), each comprising of 15 students. As the program expands to accommodate the current cohort of 27 students, efforts are ongoing to increase the availability of dedicated space.

Fundraising
The Steering Committee has established a partnership with the AIA Brooklyn Chapter to advance the goal of holding a biennial fundraising event to support departmental goals and student advancement. The first event was held successfully in Fall of 2022.

Curriculum enhancement and marketplace relevance
Enhancing the curriculum through relevant industry partnerships and certifications is an essential ingredient to long range planning and increasing student exposure to real world decision making processes. The Architecture Technology Department engaged the ULI-Urban Land Institute to implement their proprietary Urban Plan simulation model in the curriculum for the past 4 semesters. The long-range plan is to expand the ULI curricula across multiple studios and train additional faculty to deliver the course work.

New industry partnerships
A new partnership with the Passive House Institute (PHI) has been established. Current coursework and curriculum integration with Passive House curriculum and standards was piloted in the Spring 2022 semester in ARCH 2331- Building Tech II. The goal has been to integrate Passive House design and detailing into the curriculum and give the students options for certification, enhancing a graduate's value in the marketplace.

5.2.4 Strengths, challenges, and opportunities faced by the program as it strives to continuously improve learning outcomes and opportunities.

Program Response:

The strengths of the department include the dedicated faculty who continue to serve the institution and address student needs. We do a great deal with very little, relying on innovative thinking and faculty dedication and commitment to advance our student-centric goals. Affordable tuition (see 6.6.1) is an additional strength for the department as it provides equitable access to a professional architectural education which is in urgent need of diversification, which our department already embraces with its diverse student population . However, the considerable economic and personal challenges that many of our students face need to be bridged. Despite the low tuition for a five-year degree in the City of New York, attaining the funding for many of our promising students remains a challenge and results a reduction of their ability to compete with the growing number private architecture programs in New York City .

Advancing Learning Outcomes

We strive to improve learning outcomes by continuously improving our teaching. At the end of every academic year the department Appointments Committee writes annual evaluations of each full-time faculty member. The annual evaluation is based on a PARSE – (Professional Activity Report and Self Evaluation) that is geared to setting faculty goals and evaluation of overall career trajectory. The PARSE consists of a record of teaching effectiveness, scholarship, research and impact on the institution and greater community. Once the faculty evaluations are completed a conference with each faculty member is conducted to assist in guiding growth and effectiveness.

Improving Effectiveness and Access

Embracing technology through online learning and the Virtual Desktop (VDI) have been a strength. Moving to these platforms has maintained access for our students over the course of the pandemic and has opened future opportunities for distance learning for working, non-traditional students. Advancing access to technology is a key goal of the long-range planning efforts for the department and is seen as an equity issue.

Opportunities rise as the visibility of the department increases

As our program has gained visibility more local offices and noteworthy firms have entertained creating internship programs and providing scholarships for our students. As the value of our degrees rise, our graduates will become a greater resource for the department by supporting our goals and efforts. We will work to build a strong alumni association to bring further resources, funding, scholarship, and partnership opportunities in the future.

New faculty

The Department Appointments Committee (DAC) has noted that through greater visibility of our program, we have an increasingly strong applicant pool to choose from. Applicants come from top firms, and are leading professionals, who are interested in filling adjunct faculty positions. New faculty members help to keep the curriculum current with industry practices.

Challenges and Strides

The challenges that the program faces continue from the prior report. Although we have made strides in some areas there are many additional resources and characteristics, physical and financial, that are hurdles yet to be overcome. Equipment and technology access for students are a constant challenge that stem from lack of resources and funding. The COVID crisis has impacted available funding CUNY wide. Funding the department to achieve its long-range plan and provide much-needed student support in all areas remains a challenge.

Space needs are an ongoing challenge for the department given the number of students and limited available space. Our goal to provide dedicated studio space, has a long way to go to be met but we feel we have made progress in cultivating a studio environment by joining different sections of design studios in shared classrooms.

5.2.5 Ongoing outside input from others, including practitioners.

Program Response:

As mentioned above, opportunities arise as the visibility of the department increases.

If there can be a silver lining to the pandemic, it would be our department's ability to engage a broad cross section of design professionals from around the world by use of remote technology. The connections we made during this time persist today. Through our design jury process and guest lecture series, geography is no longer a limiting factor. The result has been a greater visibility and voice for the students. Circumstances have also allowed for a broader examination of our methodology and work by influential, outside practitioners and thought leaders. Participation in the jury process has increased substantially not only with design professionals but with community stakeholders and governing bodies.

In addition to an impressive array of architects and allied professionals our guests have included leaders and officials from New York City Housing Authority (NYCHA), Mayor's Office of Climate Resilience (MOCR), RETI Center (community not for profit Red Hook), RISE coalition (community not for profit Far Rockaway), Department of City Planning New York, The Waterfront Alliance (NY-NJ), Municipal Arts Society (NYC) and WeACT (Community Advocacy coalition Harlem).

Several faculty members are part of leadership structures and serve on the board of directors of professional societies opening the doors to greater student awareness of lectures, exhibitions, and opportunities at the local AIA Center for Architecture, the Architecture League of New York and the Society of American Registered Architects. Students are allowed to attend any of the events at the Center for Architecture, nearly 1200 events annually, at no charge.

The department is committed to continuing periodic super juries that examine the student work across the curriculum on a 5-year cycle.

AIA Brooklyn has brought their executive board to closely examine our structural needs and is assisted greatly in shaping our first fundraising event aimed at achieving specific elements of our long-range planning. Their input on a variety of topics have been mutually beneficial.

The program must also demonstrate that it regularly uses the results of self-assessments to advise and encourage changes and adjustments that promote student and faculty success.

Program Response:

The department uses frequent methods of periodic self-assessment including ten-year self-assessments required by the college, curriculum review meetings to ensure that courses are aligned with the department's mission and vision, annual evaluations of all full-time faculty members, peer observations of full-time and adjunct to confirm that course content is being delivered as expected, Student Evaluations of Teaching (SETs) which are a college-wide assessment tool that documents student evaluations of teaching and provides direct and anonymous feedback to full and adjunct faculty, and the assessment of student learning outcomes. The data gathered from these assessments is used to inform strategic planning decisions by the department.

- Ten-year Self-Assessments: At the program level, CUNY requires non-accredited programs to conduct a self-assessment on a 10-year cycle, which the department has recently completed. This assessment requires a self-assessment report, review by the Provost's and Dean's office, a third-party reviewer assessment and report, and a proposal for adjustments and future initiatives. Copies of the documents of our recently completed review are available through the Chair's office.

- Curriculum Review Meetings: Frequent curriculum review meetings are held by program directors, course sequence coordinators, course coordinators, and teaching faculty to ensure that our courses are aligned with the department's mission and vision, meeting NAAB criteria, and staying current with industry standards and practices.

- Annual Evaluations: Evaluations of full-time faculty are performed annually by one of the five elected members of the Department's Appointments Committee. Criteria for evaluation is based on teaching effectiveness as demonstrated by teaching observations as well as student evaluations of teaching, scholarly production, including publications and research, and service to the department, college, and university system. These evaluations are filed in the College's Institutional Staff Relations (ISR) office as part of the faculty member's permanent file.

- Peer Observations: Peer observations of all faculty teaching are performed regularly. Tenured full-time and adjunct faculty with three-year contracts are observed once a year. All non-tenured and non-certificated faculty are observed twice a year. Full-time faculty on the Department Appointments Committee (DAC) are assigned to conduct these observations and submit reports that are maintained in faculty personnel files.

- Student Evaluations of Teaching (SETs): Students evaluate a faculty member's teaching performance each semester. At the end of the semester, students anonymously complete Student Evaluation of Teaching forms. These forms are processed by the College's Assessment and Institutional Research (AIR) department. The results of the student evaluations are given to the department chairperson and the subject professor for review and dissemination to faculty. The results are included a faculty member's permanent file at the ISR office. SETS scores are reviewed each semester by the departments' appointments committee so that teaching deficiencies can be addressed and corrected.

- Assessment of Student Learning Outcomes: The department has also developed more formal and holistic approaches to student assessment that we implemented as our first cohort moved through the B. Arch program. These approaches included continuing the assessment of student reading through the college-wide Reading Effectively Across the Disciplines (READ) program, developing visual tools for assessment of student fluency with architectural drawings at a technical level and developing a "whole student" approach to assessment. This holistic approach includes documenting and reviewing a wide range of each student's activities in the classroom, including note taking, sketchbook work, reflection, design process and technical drawing and assessing these activities with comprehensive rubrics that are being more consistently used in all our courses. The data from these rubrics is then compiled into annual reports, that include improvement plans, and are reviewed and discussed by program directors, course coordinators, and the curriculum and appointments committees.

5.3 Curricular Development

The program must demonstrate a well-reasoned process for assessing its curriculum and making adjustments based on the outcome of the assessment.

Programs must also identify the frequency for assessing all or part of its curriculum.

Program Response:

The Department of Architectural Technology has developed a culture of assessment that has been codified so that it better serves the development and refinement of curriculum adjustments as well as teaching methodologies and program-level review. We currently assess at the program and course levels. Our assessment focuses on skills and knowledge specific to the discipline, but also general education skills and knowledge. This also includes interdisciplinary courses that faculty members in our department have helped develop, that are available to the full college community. The foundation of our program centers around open enrollment and the wide variation in college preparedness and learning styles of our student cohorts. This requires special attention to the teaching effectiveness of our courses and curriculum flow and has led us to pursue the following objectives and activities for assessment in our department:

- General Education Development: We actively participate in campus-wide assessment cycles focused on general education learning goals. The general college assessment plan is structured around a three-year cycle. The cycle begins with the selection of a Gen Ed student learning outcome and an assignment and rubric that will be the vehicle for the assessment. Most recently, we focused on Civic Engagement in ARCH 4812 Architectural Design VII. This vehicle is piloted to validate the assessment. In addition, our faculty participates in college wide workshops allowing peer review and input into the assignment and the assessment strategy. The second year the adjusted vehicle is administered to a larger student population so a larger data pool can be collected and analyzed. In the third year, an improvement plan is developed and implemented.

- Assess Prior Knowledge and Skills Development: In our early courses, we assess student familiarity and fluency with orthographic architectural drawing, their general and discipline specific reading skills, note taking and information organization. We are continually developing new approaches to this assessment process. For example, we ask students to analyze architectural drawings to demonstrate understanding of components, elements, and systems depicted in the drawings, including structure, circulation, fenestration as well as spatial and architectural composition.

- Monitoring Course Pass Rates: We monitor courses that have significant rates of failure and review the course objectives and assignments for the appropriate level of challenge. We also review strategies for increasing support for students including workshops and one-on-one tutoring outside of the classroom. This monitoring has also led to new courses and shifts to the flow of the curriculum to focus more on foundation skills and understanding of the discipline for first year students.

- Periodic Faculty Course Review: Each academic year, the chair selects courses for review by the full-time faculty. The course coordinator prepares a presentation of the current objectives of the course, examples of student work at different levels, including high pass and low pass. This process allows the full-time faculty to assess the level of student performance in the course but also the relationship to other courses before and after in the curriculum sequence. This process helps avoid the silo effect of courses operating in isolation and reinforces the support each course can provide to the others that follow.

- Course Redesign: The college has encouraged faculty to be change leaders that seek to institute a culture of assessment, adjustment, and change rather than stasis and inflexibility. The college uses multiple venues for instituting this culture, including fellowships through the Living Lab Grant, mentioned above, as well as professional development seminars like Bridging the Gap organized by the Faculty Commons, participation on college wide and school committees like the Gen Ed Committee, Course Coordination Committee of the School of Technology and Design. Faculty from the Department of Architectural Technology are active participants across these initiatives and serve as facilitators for a number of them.

- Critical Course Assessment: The department periodically identifies specific courses that play a critical role in the degree programs for more specific examination.

- Program Outcomes Review: As part of the responsibility of the department to the college, we periodically review our Program Outcomes for each degree. If revision is required to reflect changes to the program or the curriculum, the outcomes are adjusted. Along with this review, the department chair and liaison develop a plan to assess the program level outcomes, with specific courses identified for assessment vehicle development. We are currently entering a new cycle of this assessment work, with the vehicle development that started in fall 2017.

- NAAB Assessment: As described earlier in this report, we have also implemented a new framework to assess the NAAB PC, SC, and Shared Values. Each of these criteria has a designated faculty leader who is responsible for leading the vision, documentation, and annual assessment of the criterion. We will use the results of our annual program assessment to guide changes to the program for the following academic year.

5.3.1 The relationship between course assessment and curricular development, including NAAB program and student criteria.

Program Response:

As mentioned above our program is assessed at many levels. These assessments are crucial to the betterment of our program and the department remains committed to following our more robust assessment protocols. For the NAAB program and student criteria, our NAAB criteria leaders will collect assessment data from relevant activities and courses that is compiled into an annual report for each criterion. This annual report includes an improvement plan for the criterion that will be reviewed with the B. Arch Program Directors, Sequence and Course Coordinators, Curriculum, and Appointments Committee, and/or teaching faculty and activity facilitators. Annual meetings that include these faculty members will be held to discuss the results of the assessment report, potential improvements, and how to implement any changes.

5.3.2 The roles and responsibilities of the personnel and committees involved in setting curricular agendas and initiatives, including the curriculum committee, program coordinators, and department chairs or directors.

Program Response:

Department Chair: The chair is responsible for assuring the department assessment process is functioning as required. The chair assigns a faculty member as an assessment liaison and works with the liaison to plan strategically the department's assessment efforts.

Department Assessment Liaison: The college requires each department to have an assessment liaison that manages and monitors assessment activity in the department. This faculty member attends assessment coordination meetings at the school and college levels and works with faculty on assessment vehicles and data collection. This liaison's service allows the department to stay up to date on best practices and achieve the assessment goals of the college and the department.

Program Directors: The department recently established program director roles to coordinate and implement the B. Arch, B. Tech, and AAS degree programs. The directors are elected by the full-time faculty and serve three-year terms. Their role is to maintain the vision and integrity of each program through curriculum development, assessment, and oversight.

NAAB Criteria Leaders: Full-time faculty members serve as NAAB criteria leaders. They are responsible for maintaining the vision and assessment of the criteria. These leaders determine what course and activities should be used to meet the criteria and how the content will be assessed.

Sequence Coordinators: Full-time faculty members serve as course sequence coordinators to ensure that the objectives and content of each course in the sequence are appropriate and aligned with the goals of the sequence. These coordinators meet annually to review the sequence goals and course content.

Course Coordinators: This role is critical in our department, as many courses have multiple sections, and a significant proportion of our faculty are part-time. The course coordinator is responsible to prepare and update course materials and to meet with the faculty each semester to review the course objectives, share insights and discuss challenges. The course coordinator is the conduit and manager of the assessment process for the course, spearheading the development of the assessment plan with the department liaison and then coordinating its implementation with the faculty. The course coordinator is responsible to collate the data and work with the liaison to develop a report which includes proposed adjustments to the course in the improvement plan. The course coordinator will also periodically make a presentation to the full-time faculty in faculty meetings to keep the group up to date on student performance, communicate challenges, and seek feedback. Additionally, the course coordinators must collect assessment data annually for any course scheduled to meet NAAB criteria.

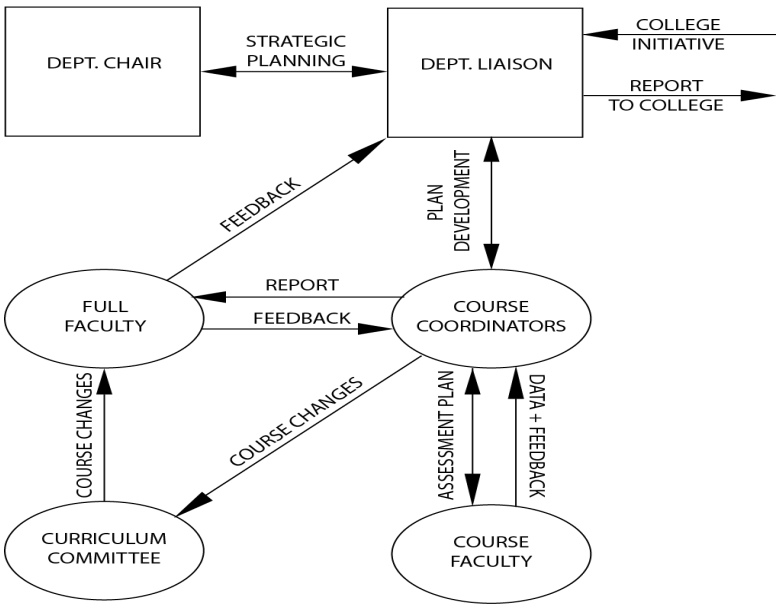
Teaching Faculty: Faculty assigned to a course with multiple sections are responsible for working together to ensure reasonable consistency in the pursuit of the course objectives. For the college, during assessment cycles, these faculty implement the assessment vehicle and document the data, reporting back to the course coordinator. Course faculty must submit annual results for any course scheduled to meet NAAB criteria.

Curriculum Committee: This committee is responsible to review all significant course changes and vet them in the context of the overall curriculum for each degree program. The committee finalizes adjustments to the course outlines and presents them to the full faculty for approval.

Full-Time Faculty: The full-time faculty are responsible for approval of all course changes and to seek feedback and communicate changes from the part-time faculty. The full-time faculty also periodically review courses directly in faculty meetings and provide feedback to the course coordinator.

Diagram of Roles and Responsibilities for Curriculum Development

DEPARTMENT OF ARCHITECTURAL TECHNOLOGY
ASSESSMENT PROCESS



5.4 Human Resources and Human Resource Development

The program must demonstrate that it has appropriate and adequately funded human resources to support student learning and achievement. Human resources include full- and part-time instructional faculty, administrative leadership, and technical, administrative, and other support staff. The program must:

5.4.1 Demonstrate that it balances the workloads of all faculty in a way that promotes student and faculty achievement.

Program Response:

Currently the Department Appointments Committee (DAC) is responsible for interviewing and hiring, adjunct and full-time faculty and adjunct college laboratory technicians (CLTs). The chair in coordination with course coordinators and appointments committee members, is responsible for teaching assignments. Together they review faculty teaching observations conducted by full time faculty and SETS (Student Evaluations of Teaching) for each instructor's assignment. We look to find the best match between academic and professional experience, curriculum requirements and student specific needs.

Each faculty member in the department of Architectural Technology has a professional background in addition to their academic experience, providing students with the benefit of real-world experience. As of Fall 2024 there are 21 full-time faculty members in the Department of Architectural Technology. All except one are registered architects; 19 are registered in the United States and one in Costa Rica. All have advanced degrees and three have PhD's. In Fall 2023 we hired one new full-time lecturer and in Fall 2024 we hired one new full-time tenure track assistant professor.

The department has two full-time senior college laboratory technicians. Senior CLT, Jean Michel, manages all the technical and computational services. His team of adjunct CLT's work to update computer hardware, software, and peripheral equipment and senior CLT Felix Baez manages the department's operations, which includes classroom equipment and the purchasing process for new and replacement technical equipment and furnishings. His team

of adjunct CLT's are responsible for classroom setup and instructional modalities requested by faculty. Along with the department's Facilities Committee, he has developed plans for space utilization and resource allocation.

There is one full time College Office Assistant (COA) who manages the front office daily operations. Ms. Tiffany Cardona serves as a consistent point of information and wayfinding for students and faculty. Working closely with the department chair, she maintains department records and collects and prepares required documents for submission to the Dean's office to manage faculty workloads and student academic actions. In Fall 2023 we hired one new part-time College Administrative Assistant to support Ms. Cardona with her workload.

A robust set of digital media and fabrication workshops and tutorials are provided to students and faculty each semester by a team of adjunct CLT's supervised by Professor Anne Leonhardt. Many of these CLTs are recent graduates of our program who are very familiar with our students and curriculum. These workshops and tutorials are recorded for online reference. Each workshop is structured for advanced registration and surveys so providers and faculty can verify attendance, participation, and feedback on instructional efficacy. The workshops are calibrated to support courses that require competency in digital tools and workflow processes. Further student and faculty support is provided by online one-to-one assistance by digital media adjunct CLT's. This has proven to be successful in allowing faculty to cover more design and technical content without stopping to focus on software skills. The workshops and one-to-one support allow for increased quality of student work and achievement.

Our part-time instructional staff of over 60 adjuncts hold prominent positions in city agencies, prestigious public or not-for-profit institutions, and with the region's leading private architecture, design, and engineering firms. Faculty maintain close ties to industry. This often leads to student internships and permanent employment.

The department's full-time faculty are increasingly balancing their teaching activities with their scholarship and creative activities. Many are engaged with publications and conferences focused on the scholarship of teaching and learning. Professors Chin and Hernandez-feiks are researching beginning design studio pedagogy and have presented at conferences such as the National Conference on the Beginning Design Student (NCBDS) and the Association of Collegiate Schools of Architecture (ACSA). Prof. Chin has also completed two book chapters one of which was on interdisciplinary teaching with Prof. Christopher Swift from the Humanities Department. Professors Bouratoglou and Dikigoropoulou developed a network of international critics to assist design students through virtual critiques throughout the semester and published their findings in the Athens Journal of Architecture in an article titled "Global Interactions into the traditional Design Studios through Blogs." Profs. Leonhardt, Aptekar, and Vaidya presented "Closing the Loop-Completing The Design/Analysis > Fabrication > Validation Cycle. The Impact of Digital Collaboration Tools on Interdisciplinary Teaching." at the International Association of Technology, Education, and Development (IATED), EDULEARN 13 conference in Spain.

Some faculty are conducting historical research, including Prof. King's research into the early work of John Roebling, engineer of the Brooklyn Bridge, a topic he has published in journal articles and presented many times to the Society of Industrial Archeology (SIA) annual conferences. He has added to the historical record through contributions to the National Archives and consults with the National Parks service in the maintenance of Roebling's Delaware Aqueduct. As of Fall 2024 Prof. King will also serve as the Executive Director of the Brooklyn Waterfront Research Center. Prof Smith regularly publishes on historic preservation including her article "Design and Building Construction in the Provincial Setting: The Case of the South Carolina Plantation House" in the South Carolina Historical Magazine in 2015. Prof. Beita Solano has published and presented at conferences on traditional Japanese design principles, most recently his presentation at the Architecture Design Conference at Mimar Sinan Fine Arts University, Istanbul. Prof. Duddy publishes regularly in peer-reviewed journals on theoretical topics that consider how epistemology, phenomenology, mathematics, and logic

shape architectural thought. One of his articles appears in the anthology *Best Writings on Mathematics, 2021*, published by Princeton University Press. He is currently in conversations with a publisher for his book tentatively named "Pride, Politics, and Place: Public Architecture and Urbanism in Downtown Brooklyn," an investigation of American urban planning using Brooklyn as a case study.

A number of faculty have led research projects focused on design-build, fabrication, advanced materials, building performance, and construction techniques. Profs. Aptekar and King led the department's research and development of the City Tech entry into the US Department of Energy's Solar Decathlon Competition that placed well in the architecture and engineering categories in the 2015 competition. Prof. Anzalone has built twelve installations in nine different countries, as part of his exploration of advanced science and technology in architectural practice. He publishes and presents at conferences regularly on this topic. Prof. Kim studies and researches building performance and presented on the topic at the Passive and Low Energy Architecture Conference in Los Angeles, CA in 2016. Prof. Conzelmann has published reviews of contemporary New York City architecture and researches Passive House design. Prof. Edwards specializes in the design of television broadcast facilities and has led numerous prominent projects in this field, including work at Rockefeller Center for NBC, Madison Square Garden, and for PBS New York (Channel 13). Prof. Zagaroli focuses on providing technical assistance to not-for-profit organizations in developing neighborhoods, contributing to the rehabilitation of residential units as well as several community facilities. Prof. Yang works in community engagement and public space activations as a testing ground for equitable and inclusive architectural pedagogy and serves on the leadership group of Design Advocates, a non-profit organization creating resources and platforms to work together for the public good. Her work was exhibited at the European Cultural Center at the Venice Biennale Architettura 2023. Her latest interdisciplinary work at the Bronx Capital District engages residents, merchants, and city agencies with a public installation and the publication of a public realm vision plan as part of the Local Center initiative, which is supported by Urban Design Forum (UDF) and Association for Neighborhood and Housing Development (ANHD).

Professor of Architecture and former Dean of the College's School of Technology and Design, Kevin Hom, has been selected for a Fulbright Award at the University of Bologna in Italy. As a Fulbright grantee, Professor Hom taught a studio course addressing issues of sustainability based upon a methodology championed by the MacArthur Foundation. Professor Hom's expertise focuses on design and includes higher education, research, medical, library, athletic and master planning projects. His designs have received numerous American Institute of Architect (AIA), NYC Fine Art Commission and Society of American Registered Architects (SARA) Awards, including their Firm of the Year Award in 2008. He was elevated to the AIA College of Fellows in 2017.

Prof. Azaroff is a leader in research of resiliency and design for risk and reconstruction. He advises U.S. Federal Emergency Management Agency (FEMA) and the Alliance for National & Community Resilience (ANCR) on developing benchmarking for community resilience planning, as well as with the City of New York and the U.S. Virgin Islands on their 2019 Hazard Mitigation Plans. He worked with the city of Houston on Vision 2020 Resilience initiative. He is serving on the New York Mayor Adam's transition team advising on sustainability and resilience. New York State Governor Hochul appointed him to the statewide Climate Impact Assessment. He is advising the Ministry of Dominica in the Caribbean on post-Hurricane Maria recovery strategies with the Kalinago people, and contributed to recently released, "Keep Safe!, guide to housing recovery for Island communities" by Enterprise Community Partners. Previously, Illya was a Technical Advisor to the Assistant Secretary for Preparedness and Response (ASPR) in Washington, DC, within the National Disaster Recovery Framework (NDRF). He has published numerous articles, presented at TEDxNYIT, and contributed to several reports on the topic while also leading the New York AIA Chapter's recovery efforts after Superstorm Sandy.

For more detailed information regarding faculty scholarly and creative activity, please see Faculty Resumes.

5.4.2 Demonstrate that it has an Architect Licensing Advisor who is actively performing the duties defined in the NCARB position description. These duties include attending the biannual NCARB Licensing Advisor Summit and/or other training opportunities to stay up-to-date on the requirements for licensure and ensure that students have resources to make informed decisions on their path to licensure.

Program Response:

Since 2015, Professor Barbara Mishara, a full-time assistant professor, had been the NCARB Academic Licensing Advisor for the Department of Architectural Technology. She regularly attended the biannual NCARB Licensing Advisor Summit and various local events and lectures that focus on staying up-to-date on the requirements for licensure. It is important to note that Prof. Mishara was away on medical leave during the 23/24 academic year and retired soon after; Professor Kenneth Conzelmann has taken over this duty. He attended the NCARB Licensing Advisor Summit last summer and continues to actively take on the responsibilities of Prof. Mishara.

New York State has atypical requirements for architectural licensing and accepts our Bachelor of Technology degree to fulfill education requirements. NAAB candidacy status and revised New York State requirements changed our status, as well introducing new requirements. Prof. Mishara maintained a relationship with Robert Lopez, R.A, Secretary of the Architecture Board, NYS Department of Education Professor Conzelmann will continue to nurture this relationship.

Professor Conzelmann ensures that students have resources to make informed decisions on their path to licensure by keeping students, faculty and alumni informed of licensing requirements. He prepares, distributes, and posts handouts and lectures on the department's online advisement portal and provides individual consultations. Each semester He lectures to the student architecture club and professional practice classes about NCARB and licensing. Starting Spring 2025 Professor Conzelmann will also be conducting a workshop presenting the requirements for licensure that all fourth- and fifth-year B. Arch students will be required to attend.

5.4.3 Demonstrate that faculty and staff have opportunities to pursue professional development that contributes to program improvement

Program Response:

Professional development for faculty and staff is provided by the Faculty Commons, focusing on pedagogy and scholarship, grant writing, grant application assistance and research techniques, and iTEC, focusing on the use of instructional technology. Additional training is provided by the Office of Faculty and Staff Relations on topics ranging from compliance courses to enhancement of administrative skills. Assistance with assessment training is offered through the college's department of Assessment and Institutional Research (AIR).

The Faculty Commons is a center for teaching, learning, scholarship, and service that coordinates professional development, grants, and assessment activities of faculty at New York City College of Technology. The Faculty Commons adopts a programmatic approach to professional development and operates as a faculty resource and think tank where members collaborate on a variety of projects to shape curriculum, pedagogy, and assessment. The current Co-Director of Faculty Commons is Professor Shelley Smith, PhD from the Department of Architectural Technology. Prof. King from our department provides two annual workshops

on behalf of the Faculty Commons to help faculty to improve their teaching through the development of a Teaching Portfolio and on the use of the colleges EPARSE system which documents faculty records for teaching, service and scholarship.

Below is a list of Faculty Commons sponsored programs:

Nucleus: A Faculty Commons Quarterly showcases creative and scholarly faculty initiatives at City Tech undertaken through the Faculty Commons. Many of our faculty have been featured or have contributed articles to this publication.
https://issuu.com/facultycommons/stacks/fc616455db874b09b483a2e529826d9f

The Faculty Commons website houses up-to-date information about the Offices of Assessment and Institutional Research and Sponsored Programs. The professional development arm features a monthly calendar in which events that are sponsored by Professional Development Advisory Council (PDAC), Writing Across the Curriculum (WAC), Ursula C. Schwerin Library, Instructional Technology Center (iTEC), First Year Writing, Reading Effectively Across Disciplines (READ), First Year Programs, Summer Institute of Teaching and Learning, Bridging the Gap study-group inquiry based seminar, and more are open to part- and full-time faculty and staff. Faculty are encouraged to participate in First Year Learning Communities and General Education electives so they can learn how to communicate and structure interdisciplinary assignments, modules, and courses around questions about the human condition, its past, present and future impact. https://facultycommons.citytech.cuny.edu/

Open Lab is an online platform which is a place to learn, work, and share. It is the College's online community, in which courses, clubs, projects and people share their interests, talents, and academic work. This platform, which incorporates e-portfolio, is an increasingly significant tool for our day-to-day operation of our college. It provides a critical communication and coordination tool as well as a virtual space for interaction and learning.
https://openlab.citytech.cuny.edu/

Living Lab Faculty Fellows participate in the Living Lab's General Education Seminar which offers the opportunity to share a rich collegial learning experience with faculty members from other disciplines and to contribute to the success of this transformational project. "A Living Laboratory: Revitalizing General Education for a 21st-Century College of Technology" is a major initiative funded by the U.S. Department of Education's Title V programm. Launched in the spring of 2011, it re-envisions General Education at City Tech using the conceptual model of the college and our Brooklyn Waterfront location as a "living lab."

Faculty members are encouraged to attend professional conferences, with financial assistance from the Professional Development Advisory Council. PDAC is a committee of faculty representing most of the departments on campus which review applications for professional travel funding and makes funding recommendations. The individual schools may also add supplemental funds to support faculty travel for professional development. Applications which support and advance faculty scholarship aligned with the college mission are funded.

Reading Effectively Across the Disciplines (READ) is a college-wide initiative that provides workshops and individualized faculty professional development, to support the adoption of strategies in classroom instruction and assignment design to improve student reading comprehension.

Annual observations make note of faculty's active service in the college, university, and the profession. All full-time tenure track professors are granted 24 workload hours of release time to advance scholarship or research initiatives. Because most faculty are actively practicing in New York City, many serve on committees in professional organizations including the AIA New York Chapter. They help organize events for the architectural community in New York and bring

the latest discussions and information to faculty and students. Some AIA New York chapter events have been hosted by City Tech, bringing experts to campus to discuss important developments in the design of the built environment. Several financial resources are available to faculty to support professional development and scholarship. They are outlined in section 5.7 Financial Resources below.

5.4.4 Describe the support services available to students in the program, including but not limited to academic and personal advising, mental well-being, career guidance, internship, and job placement.

Program Response:

Students enter with widely disparate levels of academic preparation, professional goals and personal circumstances. As an open access institution, City Tech's historic mission has been to offer opportunities for educational advancement to students regardless of financial circumstances or prior academic achievement. Several unique programs strive to support and enable students to achieve a college degree. Among these are:

- SEEK: The Percy Ellis Sutton SEEK (Search for Education, Elevation and Knowledge) program provides promising students with financial assistance beyond tuition, as well as a wide range of counseling and academic support services, including career and academic planning, personal counseling, a state- of-the-art computer lab, academic coaching and tutoring in many subject areas.

- ASAP: As a university wide initiative for community colleges, ASAP (Accelerated Study in Associate Programs) was started at City Tech in fall of 2015. It emphasizes enriched academic, financial, and personal support for students including comprehensive and personalized advisement, career counseling, tutoring, tuition waivers, MTA MetroCards and additional financial assistance to defray the cost of textbooks. City Tech is one of the senior colleges in the CUNY system to provide ASAP services to students who are working toward an Associate degree and a college where ASAP will focus heavily on students in STEM disciplines. The program has garnered national recognition, including a citation by President Obama for doubling the graduation rates of participating students.

- Peer Mentoring: A select number of students receive compensation to support and tutor other students. Currently was originally funded through a grant to the Construction Management/ Civil Engineering department and is currently funded by the RISE program as part of the Robin Hood Foundation grant (RF account #71897-0003), "Responding to Learning Loss",

- The Learning Centers: Located across our campus, learning centers provide our students with free access to computers, software and tutoring in support of their studies. The Voorhees building, which houses the Architecture program, has an open computer lab which provides access to and support with all of the advanced software used in our curriculum. Architecture students are hired to work here to mentor other students.

- Departmental Workshops: Offered in support of our highly technical curriculum these workshops are coordinated with our curriculum offerings and provide students with access to tutors to facilitate the use of software, fabrication equipment, shop tools, and other technology.

- Online Tutorials: A library of Video and PDF tutorials created by faculty, staff, and grant initiatives provides additional support accessible both on and off campus.

- One-on-one help and Classroom Support: College Laboratory Technicians (CLT's) provide one-on-one and small group support to students on a regular schedule or by appointment. CLT's are typically hired from among our more advanced students and adjunct faculty.

- Design_Serv: As part of the Architectural licensing process (AXP) junior architects are required to complete experience hours within experience Setting 'A' or Setting 'O'. The Department of Architectural Technology was approved in January 2019 by NCARB as a "Community Based Design Center/Collaborative" within Setting 'O'. Junior architects may serve up to 320 hours as mentors to students within the design and technical studios.

- The Counseling Services Center supports the educational, emotional and career development of City Tech students by providing opportunities for skill development, counseling and referrals that address obstacles to success. Services include individual counseling for academic, career and personal challenges as well as crisis intervention. We also provide support groups, referrals to campus and community resources, campus outreach, workshops, and faculty/staff consultation. The Office of Veteran Support Services receives supervision and oversight from this office. During the pandemic, student counselors were invited to Town Hall meetings to familiarize students and faculty with their services and provide a brief guided relaxation exercise.

- City Tech's Professional Development Center (PDC) - support students and alumni by cultivating essential competencies necessary to make informed decisions to achieve their career goals. The PDC facilitates interaction among undergraduate students, alumni, employers, and organizations to create access and opportunities, which help students pursue their personal and professional objectives. Their work complements the online jobs and internships board maintained by Professor Ken Conzelmann.

5.5 Social Equity, Diversity, and Inclusion

The program must demonstrate its commitment to diversity and inclusion among current and prospective faculty, staff, and students. The program must:

5.5.1 Describe how this commitment is reflected in the distribution of its human, physical, and financial resources.

City Tech is rooted in diversity and inclusion from its inception as a GI funded vocational program for WWII veterans. The Department of Architectural Technology continues this tradition of transformational education through the distribution and application of its human, physical and financial resources.

The core of the New York City College of Technology's Mission is a commitment "to provide broad access to high quality technological and professional education for a diverse urban population." We are an "engine of economic mobility" consistently ranked highly on CollegeNET's Social Mobility Index. Due to its central Brooklyn location, flexible course structure, and affordability, the student body is composed of a diverse socio-economic and race/ethnicity population, many of which are underrepresented in the architectural professional community. We are categorized by the US Department of Education as a Hispanic Serving Institution. Additional general information about the college can be found in the link below.

https://www.citytech.cuny.edu/consumer-info/

There are several broad strategies the department employs to preserve its commitment to diversity and inclusion. These include: 1. Expand and reinforce existing networks with primary education programs. 2. Reconfigure physical spaces to encourage direct communication and ideas interchange 3. Solicit external funding and support for scholarships, grants and paid internships to draw students into career pathways earlier in their studies 4. Curriculum modifications to highlight

representation in design, history and culture 5. Address social and professional isolation by supporting student engagement and networking at professional and cultural events throughout the city. 6. Recruitment and training of effective and engaged instructors and staff. 7. Disrupt the hiring cycle between private colleges and private practices with mentorship and pre-internship programs.

It is important to note that when the Bachelor of Architecture Program was developed, one of its goals was to ensure the diversity of students that exists at the institution is not reduced. The link and table below show that since its inception, the diversity of students in the B. Arch program aligns with the diverse population college wide. College Fact Sheet

Fall 2023 Profile of Undergraduate Students at the College

UNDERGRADUATE PROFILE, FALL 2023

Enrollment
13,784 65% full-time
35% part-time

Among those in degree programs:
Bachelor (49%)
Associate (51%)

By School
49% School of Technology & Design
39% School of Professional Studies
12% School of Arts & Sciences

Background
Of those responding:
43% born outside of U.S. (127 countries represented)

Residence
43.8% Brooklyn
23% Queens
5.4% Manhattan
9.6% Bronx
3% Staten Island
9.0% Other NY State
2.7% Other U.S. State
4.0% International Students

Race/Ethnicity* 34% Hispanic
27% Black
21% Asian
11% White (non-Hispanic)
2% Other
4% Nonresident

* 2021 IPEDS data

Median Age 21

2018-2023 Profiles of Enrolled B. Arch Students

BArch Students	2018-2019		2019-2020		2020-2021		2021-2022		2022-2023		2023-2024	
White	2	8.70%	6	13.64%	9	13.04%	11	12.79%	11	13.10%	8	10.81%
Hispanic	10	43.48%	20	45.45%	33	47.83%	40	46.51%	38	45.24%	33	44.59%
Asian	6	26.09%	8	18.18%	13	18.84%	18	20.93%	18	21.43%	15	20.27%
Black	3	13.04%	6	13.64%	10	14.49%	13	15.12%	11	13.10%	11	14.86%
Other	2	8.70%	4	9.09%	4	5.80%	4	4.65%	6	7.14%	7	9.46%
Male	10	43.48%	21	47.73%	34	49.28%	41	47.67%	36	42.86%	35	47.30%
Female	13	56.52%	23	52.27%	35	50.72%	45	52.33%	48	57.14%	39	52.70%

The admissions process was designed with this agenda in mind. The Advance Standing Admissions entry point is one of the most important tools and investments the department has made to meet this goal. It provides a structure to support and nurture the talent of students who otherwise would find it difficult to enter a B. Arch Program, often due to inadequate preparatory education. These students enter the department as B. Tech students, via an open enrollment process. This allows time for these students to mature, consider their career goals and develop the

requisite skills to become successful students within the B. Arch Program. A large percentage our students are first generation high school graduates unfamiliar with the profession and what is required of them in a pre-professional program. Consequently, we structured curriculum so that each course a student takes as a B. Tech student, during their first five semesters, will seamlessly transfer to the B. Arch Program. This provides an access point to the B. Arch program after the completion of two critically formative years in the program. This method has resulted in a 100% graduation rate for the first two cohorts of Advanced Standing Students admitted into the program which is in sharp contrast to the low four-year graduation rate of the B. Tech students.

Low tuition costs help to maintain a socio-economically diverse and inclusive student body. Additionally, our students often qualify for financial aid or subsidized tuition by the state. The college hosts programs to help students succeed academically such as ASAP (Accelerated Study in Associate Programs) and SEEK (Search for Education Elevation and Knowledge). At the department level, we recognize that most of our students work and have familial responsibilities. Responding to this need, the department schedules multiple sections of design studio and building technology courses at different times throughout the day. Below is an example of ARCH Design III schedule options for the fall 2023.

ARCH 2312 - Architectural Design III

CLASS	SECTION	DAYS & TIMES	ROOM	INSTRUCTOR
35798	D021-LAB Regular	MoWe 8:30AM - 11:50AM	Voorhees V-812	Paul Coughlin
35811	D022-LAB Regular	MoWe 1:00PM - 4:20PM	Voorhees V-812	Joseph Vidich
21452	D023-LAB Regular	MoWe 1:00PM - 4:20PM	Voorhees V-812	William Fryer
41308	D024-LEC Regular	We 5:00PM - 5:50PM We 5:00PM - 5:50PM We 5:00PM - 5:50PM We 5:00PM - 5:50PM We 5:00PM - 5:50PM	Namm N-402 Namm N-402 Namm N-402 Namm N-402 Namm N-402	Yan Wang Joseph Vidich Paul Coughlin Eugene Park William Fryer
55989	D025-LAB Regular	MoWe 8:30AM - 11:50AM	Voorhees V-812	Eugene Park
21451	E007-LAB Regular	MoWe 6:00PM - 9:20PM	Voorhees V-812	Yan Wang

We recognize that supporting diversity, equity and inclusion requires resources outside of class for students to supplement their education and make up for deficits in their primary education. The department offers a large number of workshops, one-on-one student help and academic mentoring programs. All adjunct faculty are given one (1) paid office hour per week for every three (3) teaching hours and are periodically monitored to ensure student access. A typical studio at 9 workload hours per week means that faculty member is paid an additional 3 hours each week to assist students with academic or professional advice. Financially, the department solicits funds to provide scholarships and grants to our students to assist with expenses beyond tuition. The Selldorf Architects scholarship provides a full year's tuition to a high performing student on an annual basis. The department has split this scholarship to provide funds for two students. Regular funding from The Brooklyn Studio and senior leadership of the BKLYN AIA are used to provide laptop purchase grants for students with demonstrated need.

Evidence:
Workshops Schedule
One on one Student help
Adjunct office hour schedule
Selldorf Scholarship
Laptop Grant

From a faculty and staff perspective, as stated in the Reaffirmation Statement issued in September 2023, linked below, both the department and college are committed and invested in supporting equity, diversity, and inclusion in its faculty and staff.

2023 Reaffirmation Statement

The Department's Appointments Committee (DAC) is charged with the task of pursuing the goals of diversity and equal opportunity through recruitment, retention, and workforce development.

The work of this committee is reflected in the last five (5) full-time faculty positions that were filled. All are highly qualified candidates who contribute to the diversified pool of full-time faculty and move the department closer to a reflection of the demographics of our student population. They include four females: two Asian, one Hispanic and one Black, and one Asian male. All have proven to be excellent additions and their contributions are encouraged, respected, and supported by the department. Three out of the four currently hold leadership positions as: the interim Department Chair and B. Arch Program Co-Directors. The table below only reflects the last two hires since two full-time positions have been available since 2018.

Full-Time Faculty	2018-2019		2019-2020		2020-2021		2021-2022		2022-2023		2023-2024	
White	13	65%	13	61.90%	13	61.90%	13	65%	12	60%	12	57.14%
Hispanic	3	15%	3	14.29%	3	14.29%	2	10%	2	10%	2	9.52%
Asian	3	15%	4	19.05%	4	19.05%	4	20%	5	25%	5	23.81%
Black	1	5%	1	4.76%	1	4.76%	1	5%	1	5%	2	9.52%
Other	0		0		0		0		0		0	
Male	13	65%	14	66.67%	14	66.67%	13	65%	12	60%	12	57.14%
Female	7	35%	7	33.33%	7	33.33%	7	35%	8	40%	9	42.86%
Part-Time Faculty	2018-2019		2019-2020		2020-2021		2021-2022		2022-2023		2023-2024	
White	48	71.64%	53	75.71%	47	73.44%	51	73.91%	53	63.86%	52	67.53%
Hispanic	7	10.45%	3	4.29%	4	6.25%	5	7.25%	7	8.43%	8	10.39%
Asian	11	16.42%	13	18.57%	11	17.19%	10	14.49%	16	19.28%	14	18.18%
Black	1	1.49%	1	1.43%	1	1.56%	2	2.90%	4	4.82%	2	2.60%
Other	0		0		1	1.56%	1	1.45%	3	3.61%	1	1.30%
Male	46	68.66%	47	67.14%	44	68.75%	45	65.22%	51	61.45%	54	70.13%
Female	21	31.34%	21	30%	19	29.69%	22	31.88%	31	37.35%	21	27.27%
Other			2	2.86%	1	1.56%	2	2.90%	1	1.20%	2	2.60%

The demographic analysis of our staff also reflects the department's commitment to diversity and inclusion. Please refer to chart below

Staff	2023-2024	
White	5	14%
Hispanic	16	46%
Asian	3	9%
Black	9	26%
Other	2	6%
Total	35	
Male		66%
Female		34%

The department values the knowledge and experience of our own students. Most of our support staff (Adj. CLT's) running the fabrication labs, software workshops, and providing classroom digital assistance, are comprised of current students and department graduates. 69% of our current staff are City Tech students or alumni. The department invests in their growth providing opportunities to teach, manage and become stakeholders in the success of the program.

In addition to our commitment to an ethnically and socio-economically diverse community, the department pursues inclusivity for persons who are differently abled. As a recent example, the department promoted an Adjunct CLT, who requires accessibility accommodations, to a full-time position managing the IT team for the entire department.

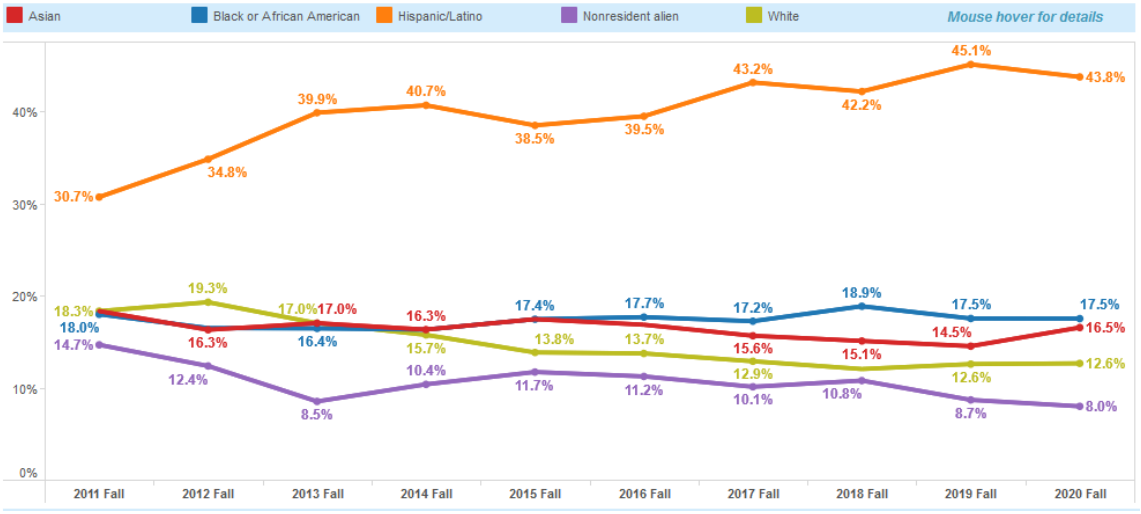
Pre-Internship Programs:

The Pre-Internship program (see p24.) provides our student's first-time exposure and access to high-profile studios in New York City to prepare them for internships and employment. The intent is for these studios to spend time directly with our students to hear their stories and experiences; to see their talents in-person as a counterbalance for our less recognizable school name. The program has proven a success, bringing much needed exposure to the department, placing graduates into name brand offices which will jump start their careers. Another result is that many of the offices hosting Pre-Internship programs have recommended staff to apply for adjunct teaching positions within the department. This is a novel loop which enables a competitive edge for our students and brings industry to recognize, value and participate in the effort to expand diversity and inclusion.

The faculty and staff are actively engaged in maintaining and expanding an equitable, diverse, and inclusive community, and the college supports this effort with several initiatives and declarations:

1. General Policies on the College Policies page
2. Faculty Commons Monthly archive to show regular events supporting various affinity groups
3. Events: Campus Climate, LGBTQIA+, Mother Language Day, Black History Month, Black & Latinx Transgender Solidarity, Latinas in Higher Ed, Americans and the Holocaust
4. CUNY Campus Climate Grants
5. Implementation of the college HSI Committee and related activities
6. Series of initiatives launched as a result of the COACHE surveys
7. Diversity, Equity and Inclusion Hub
8. CUNY University policy

Department of Architectural Technology Fall Enrollment by Ethnicity 2011-2020[2]



City Tech offers a diverse, multicultural learning environment. Diversity is a central asset of our program and our culture at City Tech. Students and faculty members come from more than 138 countries and speak over 85 languages. Of those responding:

- 43% of the students were born outside of U.S.
- 62.3% report a language other than English spoken at home
- 33% list their parents as college graduates
- 58% of the students report household incomes of less than $30,000
- 80% of incoming freshmen receive need-based aid
- 67% of continuing students receive need-based aid
- 25% percent work more than 20 hours per week.

The U.S. News & World annual survey report shows that City Tech has been among the leaders in the diversity of the students it serves among all Comprehensive Colleges/Bachelor's (North) for the past five years. This survey lists our college among the leaders in new student retention in colleges of its type. City Tech is a federally designated Hispanic Serving Institution (HSI).

The diversity of our students is fundamental to our program. Changes to our curriculum and degree programs are examined specifically for their potential impact on student diversity and access. The open enrollment policy allows students of all backgrounds a starting point in our department. Our goal is to help as many of these students as possible reach a level where they become eligible to apply for the B. Arch degree. We anticipate the need to adjust early curriculum and add further pre-college support mechanisms to improve access to the new degree program. A critical long-range goal is to ensure that access to the B. Arch program does not reduce diversity. We collect and monitor data through the annual assessment of student applicants at the first- and third-year entry points.

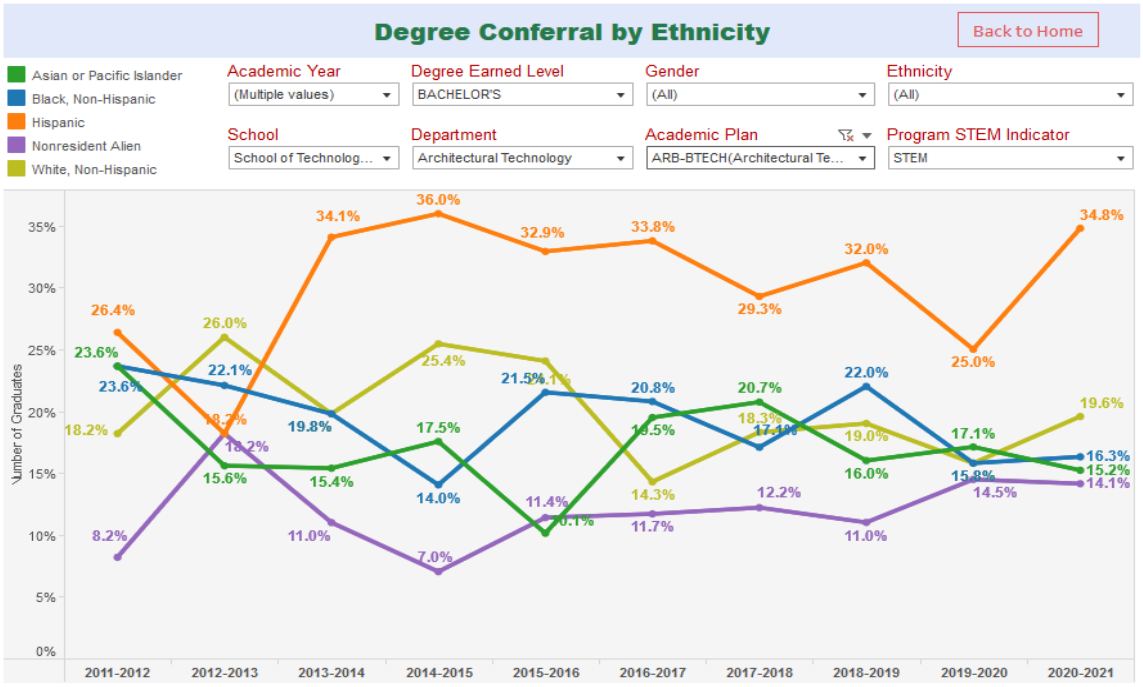
- We have started a new intensive architectural summer program for high school students with the College Now program. College Now is a comprehensive collaborative program of the City University of New York (CUNY) and the New York City Department of Education (DOE) designed to improve the academic achievement of NYC Public High School students, while preparing them for the demands of college. College Now at City Tech offers students from designated high schools the opportunity to enroll in college credit-bearing courses free of cost.

[2] Data provided by NYC College of Technology Office of Assessment, Institutional Research & Effectiveness, Link: https://www.citytech.cuny.edu/aire/fall-enrollment-trend.aspx

- The department communicates periodically with its New York City Career and Technical Education (CTE) Public High School partners to discuss program changes and curriculum updates at the Department of Architectural Technology. Invitations are extended to guidance counselors, principals, and students to open forums at the department on B. Arch program admissions requirements and application processes.

- City Poly High: City Polytechnic High School of Engineering, Architecture and Technology, which opened in fall 2009, was New York City's first 9-13 year high school, where students can earn both a high school diploma and an associate degree through a comprehensive six-year course of study. In 2015 it became one of the New York State P-TECH network of schools and adopted a 6-year model, replacing the trimester with a more traditional semester calendar. The school is a result of a partnership between the Departments of Architectural Technology and Construction Management at City Tech with the New York City Department of Education (DOE) and National Academy Foundation (NAF). Curriculum at this school, which integrates academics with technical subjects, was developed by City Tech faculty.

Department of Architectural Technology Degree Conferral by Ethnicity 2011-2021[3]



5.5.2 Describe its plan for maintaining or increasing the diversity of its faculty and staff since the last accreditation cycle, how it has implemented the plan, and what it intends to do during the next accreditation cycle. Also, compare the program's faculty and staff demographics with that of the program's students and other benchmarks the program deems relevant.

Program Response:

As noted above in section 5.5.1 the department is invested in and celebrates the diversity of its students, faculty and staff. It also recognizes that the population of the staff and students reflects the diverse student body of the college, but that there is a disparity in this diversity when it comes

[3] Data provided by NYC College of Technology Office of Assessment, Institutional Research & Effectiveness, Link: https://www.citytech.cuny.edu/aire/degree-conferral.aspx

to faculty. Although we are actively working towards reducing the disproportion, we do want to acknowledge that the disparity is related to the candidates available and a competition for hiring resources in comparison to well-known private program in the city. When comparing the demographics of the profession, outlined in the AIA Demographics Report to those of our faculty, our faculty reflects a more diverse pool than the one that currently exists in the profession.

	AIA Numbers	Full-Time Faculty	Part-Time Faculty	Department Staff	BArch Students
White	64.00%	57.14%	63.86%	14.29%	10.81%
Hispanic	5.50%	9.52%	8.43%	45.71%	44.59%
Asian	7.00%	23.81%	19.28%	8.57%	20.27%
Black	2.00%	9.52%	4.82%	25.71%	14.86%
Other	21.50%		3.61%	5.71%	9.46%

The department recognizes that it must do more to increase the diversity of our faculty to be in alignment with the students we serve. In response, the Department Appointments Committee (DAC) has been tasked with pursuing more robust recruitment strategies to support this agenda with a focus on the adjunct faculty pool.

The Department Appointments Committee (DAC) is currently crafting a strategy to promote teaching opportunities to these communities. It has identified NOMA, Latinos in Design, HBCU and our own alumni as three potential groups the department can connect with to advertise and disseminate information about teaching opportunities. The Department Chair and DAC Chair, Sanjive Vaidya, has spoken publicly and published about this agenda at several conferences and panel discussions with recognized figures similarly advancing this effort in the profession:

- Goldstein, Brian., **Rickenbacker, Shawn**., Vaidya, Sanjive., Davis, Steven., **Phillips, Karen**. (2021, October 14). **J. Max Bond Jr**. Lecture | The Man, The Legacy. [Presentation & Panel Discussion]
- **Lokko, Lesley**., **Sutton, Sharon**., **Rickenbacker, Shawn**., **Henry, Lisa C**., Vaidya, Sanjive., Weisz, Claire. (2020, October 14). *A Case for Public Design Education*. [Conference Presentation]. New York
- Vaidya, Sanjive and **Sutton, Sharon** (2020, July 30). New Grounds for Design Education. The New York Review of Architecture and The Architectural League of New York, New York.
- Bohanon, Mariah and Stewart, Mariah. "*Architecture Schools Are Becoming More Diverse, but the Profession Still Faces Challenges*." Insight into Diversity, Oct. 2020, pp. 52-54.

The next milestone is to produce and disseminate promotional materials during the Fall 2024 semester in preparation for teaching assignments for Spring 2025 and future semesters. These materials will be comprised of : *public programs, keynote lectures, social media campaigns, pre-internships, mentorships and fundraising events* to express the departmental mission clearly to potential candidates in order to compete with branded architectural programs. Additionally, cultivating graduates of our program to join instructional staff remains an effective method for diversification and inclusion.

The department DAC continues its concerted effort to increase these numbers by the next accreditation visit.

5.5.3 Describe its plan for maintaining or increasing the diversity of its students since the last accreditation cycle, how it has implemented the plan, and what it intends to do during the next accreditation cycle. Also, compare the program's student demographics with that of the institution and other benchmarks the program deems relevant.

Program Response:

To support and maintain this initiative the Co- Directors of the B. Arch Program and the Department Chair actively monitor these numbers, and have the following plan in place to help sustain and potentially grow them:

- **Maintaining and further grow the Advanced Standing pool of applicants.** As described above this group focuses on students who start their career at the department in the Bachelor of Technology Program. The B. Arch Co-directors hold multiple public information sessions throughout the academic year. They visit all Architectural Design III and IV sections and present information on the different academic program tracks reviewing B. Arch eligibility and application requirements with the students. They offer two sessions per semester specifically to demystify the application requirements and process. Since the last accreditation visit the number of students admitted as Advanced Standing students increased by 33%.
- **B. Arch Admissions Committee Guidelines.** The B. Arch Admissions Committee, in addition to being responsible for reviewing applications for admissions, is responsible for tracking demographic statistical information to ensure both the pool of applicants and admitted students reflect the high diversity trends reported by the college. If the B. Arch diversity admissions trend diminishes, the committee is charged with developing additional tools, strategies, and rules to help sustain and grow it.
- **College Now and more**
  The department is creating deeper ties with the eleven technical public high schools it maintains '*memos of understanding* ' to connect and share information with prospective students, encouraging a diverse pool of prepared applicants. ***COLLEGE NOW*** is one of these initiatives. It is a comprehensive collaborative program between the City University of New York (CUNY) and the New York City Department of Education (DOE) designed to improve the academic achievement of NYC Public High School students, while preparing them for the demands of college. The course, *Introduction to Architecture*, is offered at City Tech and taught by our faculty. It is important to note that students who participate in the program receive college credit-bearing courses free of cost. Additionally, we have an articulation agreement with City Polytechnic High School of Engineering, Architecture, and Technology, another public New York City high school, which allows qualified high school students to earn college credit in our department while still in high school. If they continue in our program, they can apply those credits towards a degree from our program.
- **Social Media Presence**
  The department hired a part time social media coordinator. This former student developed templates and a process to regularly highlight the achievement of current students and alumni across multiple social media channels. She organized the Architecture Club and AIAs to likewise promote upcoming events and the results. These platforms are gathering a significant following from the current student body, alumni and faculty. They are a component of recruitment, highlighting diversity and broadcasting inclusion. The department utilizes these channels in lieu of a costly ad campaign and catalog. Furthermore, the costs to join popular accredited school listing catalogs and sites are not sustainable within the limited program budgets.

The chart below documents that the B. Arch program has successfully maintained its diversity goals over the past six years, and continues to reflect the overall college demographics.

	B. Arch Students						College	AIA Numbers
	2018-2019	2019-2020	2020-2021	2021-2022	2022-2023	2023-2024	2023-2024	2023
White	8.70%	13.64%	13.04%	12.79%	13.10%	10.81%	11%	64%
Hispanic	43.48%	45.45%	47.83%	46.51%	45.24%	44.59%	34%	6%
Asian	26.09%	18.18%	18.84%	20.93%	21.43%	20.27%	21%	7%
Black	13.04%	13.64%	14.49%	15.12%	13.10%	14.86%	27%	2%
Other	8.70%	9.09%	5.80%	4.65%	7.14%	9.46%	6%	22%
Male	43.48%	47.73%	49.28%	47.67%	42.86%	47.30%	54%	54%
Female	56.52%	52.27%	50.72%	52.33%	57.14%	52.70%	46%	40%
other	<1%	<1%	<1%	<1%	<1%	<1%	<1%	6%

2018-2024 Profiles of Enrolled B. Arch Students vs College vs AIA Licensed Professionals

Additionally, Architecture faculty are involved in department and college-wide activities as Principal Investigator's (PI's) and participants in City Tech's **STEM Success Collaborative**, a 5-year, $3 million project funded under the US Department of Education's Developing Hispanic-Serving Institutions program. The project seeks to *improve retention, graduation, and workforce readiness of Hispanic and low-income STEM-interested students by strengthening and coordinating academic and support programs for students in their first two years of study.* A guiding rational and conceptual inspiration for the **STEM Success Collaborative** was a project implemented at eight California State University campuses focused on increasing success for first-generation and underrepresented students in STEM. The key finding was that specific interventions matter less than the integration of multiple support programs through cross-institutional collaborations to create a "unified community of support." Guided by this model, City Tech's **STEM Success Collaborative** has launched a set of integrative initiatives: 1) academic department cluster collaborations to guide students into the right major, and to provide micro-credentialling, professionalism resources, and internship opportunities; 2) a Student Success Collaborative to coordinate the first year experience, peer mentoring programs, and support for a new Student Success Center; and 3) a "Smart Campus" initiative in collaboration with the Office of Communications, Facilities, and others to improve digital and physical resource navigation and wayfinding, and to create an intentionally welcoming and supportive environment for all students.

Furthermore, Professor Kevin Hom from the department has spearheaded the New York City College of Technology's 2023-2024 Anti-Hate Proposal, titled "Creating Connections, Challenging Stereotypes, and Celebrating the Diversity of Asian American and Pacific Islander (AAPI) and Jewish Communities," an initiative aimed at fostering inclusivity and combating discrimination on campus. Led by a dedicated team of faculty, the project features a series of events, including storytelling sessions, interactive workshops, panel discussions, performance arts, art exhibitions, and film screenings, culminating in a celebration during AAPI Heritage Month in May 2024. The program seeks to engage students, faculty, and staff in meaningful conversations about cultural sensitivity and bias, ultimately creating a more supportive environment for AAPI and Jewish communities. The initiative will also produce a digital archive of stories and materials, serving as a lasting testament to the experiences and resilience of these communities.

5.5.4 Document what institutional, college, or program policies are in place to further Equal Employment Opportunity/Affirmative Action (EEO/AA), as well as any other social equity, diversity, and inclusion initiatives at the program, college, or institutional level.

Program Response:

- The college and department are regularly informed and guided by The Office of Compliance and Diversity. This office is responsible for administering the college's recruitment, hiring, appointment, and equal opportunity policies and procedures ensuring compliance with related laws, rules, and regulations dealing with human rights.

  The director of the Compliance and Diversity Office reports to the president of the college and serves as the chief diversity officer, Title IX coordinator, a 504/ADA coordinator and domestic violence awareness and prevention coordinator for NYC College of Technology. She ensures compliance with the university's policies and procedures regarding searches, Affirmative Action, Equal Employment Opportunity, discrimination prevention including sexual harassment prevention and domestic violence awareness and prevention. The CDO prepares the college's annual Affirmative Action Plan and related reports as mandated by the university. The reports can be found here: https://www.citytech.cuny.edu/compliance-diversity/index.aspx

- The City University of New York (CUNY) offers many programs across its campuses to celebrate, discuss and inspire social equity, diversity and inclusion. The University's commitment to diversity is posited on the following principles:

1. Engendering values and implementing policies that enhance respect for individuals and their cultures promotes excellence and an inclusive educational experience
2. Diversifying the University's workforce strengthens the institution, encourages the exchange of new ideas, and enriches campus life
3. Cultivating diversity and combating bigotry are an inextricable part of the educational mission of the University
4. Fostering tolerance, sensitivity, and mutual respect throughout CUNY is beneficial to all members of the University community

- The Department of Architectural Technology worked closely with the Department of African American studies to co-sponsor a talk by Mabel O. Wilson at City Tech. This was an enormously successful event with over 100 students in attendance. Dr. Wilson graciously offered her time to engage a small group of black architecture students in an intimate conversation about her background in practice and academics and hear their concerns about the profession. The Department Chair, Marta Effinger Crichlow attended a housing studio jury where the studio brief overlaps with course content from AFR 3000ID "Black New York". This exchange and collaboration is expected to yield more interdisciplinary exchanges in coming semesters.

- As previously mentioned, the $3M USDOE Title V grant was awarded to Prof. Smith. She and the department will use this grant to expand education opportunities for and to improve the attainment of Hispanic Students.

- The Perkins Peer Advisement Program is also focused on giving exemplary upper-level female students a platform to contribute to the department and grow their leadership skills by becoming mentors themselves. Through the grant, students are hired as teacher assistants and work with students and faculty in first-year studio courses.

5.5.5 Describe the resources and procedures in place to provide adaptive environments and effective strategies to support faculty, staff, and students with different physical and/or mental abilities

Program Response:

The Center for Student Accessibility works directly with faculty and students to provide accommodations for students with different physical and/or mental abilities. The Center provides support to enrolled students who have documented permanent or temporary disabilities. The Center's primary mission is to support the educational goals for enrolled students with disabilities through access, empowerment, resources, advocacy, collaboration and outreach throughout the College and the community at large. The Center aids in the areas of enrollment, academic advisement, tutoring, assistive technologies, and testing accommodations.

The Center for Student Accessibility works closely with faculty and staff in an advisory capacity and assists in the development of reasonable accommodations that allow students with disabilities full participation in all the programs and activities offered at City Tech while meeting the academic standards maintained by the College.

The department's facilities plan to increase flexibility in instructional modalities using operable furniture paired with the Virtual Desktop Infrastructure (VDI), will enable adaptive instructional environments and is a strategy to support faculty, staff, and students with different physical abilities.

Additional resources can be found here: https://www.citytech.cuny.edu/accessibility/

5.6 Physical Resources

The program must describe its physical resources and demonstrate how they safely and equitably support the program's pedagogical approach and student and faculty achievement. Physical resources include but are not limited to the following:

5.6.1 Space to support and encourage studio-based learning.

Program Response:

The Department of Architectural Technology is located on the eighth floor of Voorhees Hall. Classrooms, computer labs, and faculty offices occupy 12,682 SF, or 87% of the net floor area. The office suite of the Dean of the School of Technology and Design occupies the remaining 13% or 1,951 SF. Additional square footage on the second floor is dedicated to classrooms. The department also has access to a drafting studio and a few lecture classrooms on the third floor, flexible classrooms and thesis studio on the second floor, and a fabrication space with CNC mills on the first floor.

Voorhees Hall underwent a $38 million renovation funded by CUNY-Wide Condition Assessment Funds. Completed in Spring 2013, the work included a new glass façade with added windows to increase natural lighting and improve the entrance lobby. The project was completed under budget and managed by the Dormitory Authority of the State of New York (DASNY). The surplus funds were used to enhance classrooms, faculty offices, the cafeteria, lobby, and common spaces. Work on the interior of the building began in Summer 2013.

As of Fall 2024 the Department of Architectural Technology serves a large student body of approximately 800 commuter students with 21 full-time teaching faculty and over 60 adjuncts.

Current Space Allocation:

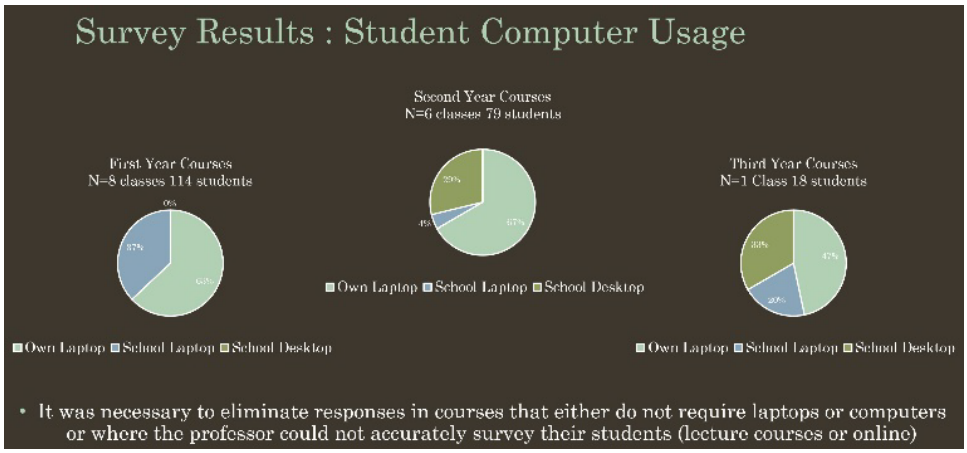
Studio space is the most critical space typology for any school of architecture due to the clear hierarchical position of the studio curriculum as the place for exploration and synthesis of the broad range of skills and knowledge inherent in the discipline. Despite the challenges of utilizing existing space built for a different purpose and learning objectives, we have transformed many classrooms, offices, pin-up walls, and flexible spaces to support active student life and studio culture.

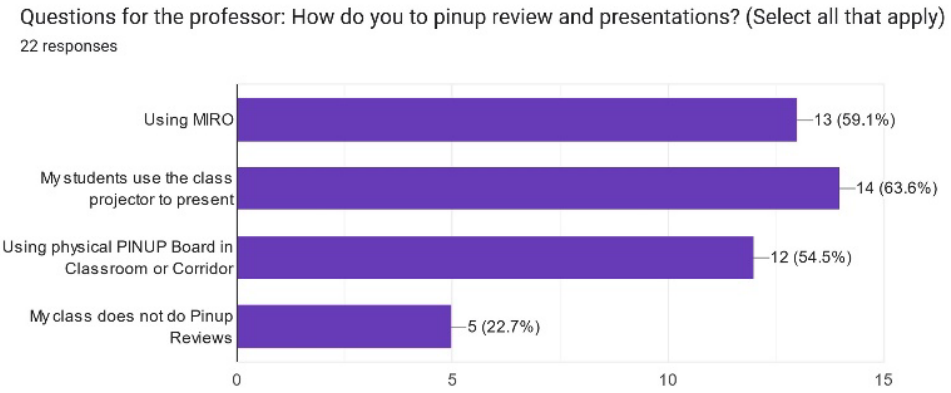
During the height of the pandemic, space planning initiatives and equipment upgrades were put on hold. Available resources were diverted to assisting students and faculty with distance learning. The college purchased numerous laptops and mobile Wi-Fi devices for distribution to students without adequate equipment for remote classroom work. Faculty were trained in remote instruction tools and content delivery. The Virtual Desktop Initiative remains a valuable tool for the Department of Architectural Technology students. The Chief Information Officer and SOTD Dean have submitted a request to expand this tool via the Capital Funding Process. Less costly remote access software was implemented during the Fall 2020 semester to leverage computer equipment currently on campus. Upgrades have advanced slowly as the college pulls out of pandemic spending and recovers lost enrollment.

As described in detail in section I.2.2 Physical Resources, the college has begun to move forward with plans to upgrade and expand student computing equipment and facilities. A dedicated space has been allocated for the B. Arch Thesis students, and two classrooms were created on the second floor of Voorhees after all faculty offices had been consolidated on the 8th floor. The new classroom spaces are designed and developed carefully as a model flex space for multi-modal instruction and large-format presentation delivery. The Chief Information Officer has met with the department to discuss ideas for maximizing the use of these rooms with advanced audio-visual equipment.

In addition, scholarly research on teaching reinforces the need for instructional spaces to allow for multiple modes of teaching and interaction. This requirement impacts space and furniture selection and the provision of technology access for students. A college-wide report “Reconsidering the Learning Environment”, developed by the College Council’s Buildings and Grounds Committee, provides guidance on the latest scholarship and approaches to facilitating multi-modal teaching spaces, which we will adopt where possible.

The department has implemented structural initiatives and changes that target immediate outcomes and long-range planning to address these areas of concern. The continued work of the Facilities Committee (Prof. Paul King, chair) assesses current and future classroom layout, furniture, and equipment needs. The committee's recent survey identified outmoded classroom settings while maintaining equitable access to adequate technology and resources for all instructors and students.



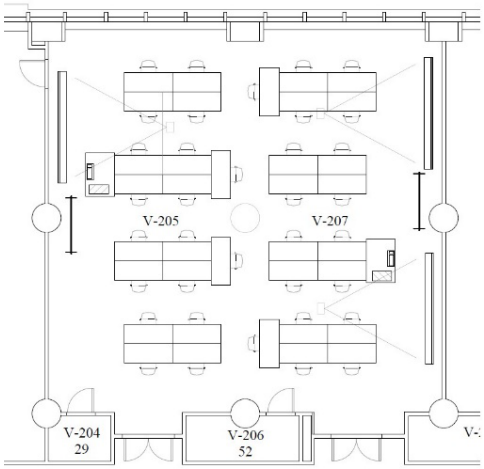


The department continues to look for ways to create shared and flexible learning environments. The second-floor classrooms (V-205 and V-207) were reconfigured at the beginning of Fall 2023 with movable desks to provide flexible forms of learning for the first-year students that can accommodate individual and group learning and encourage model making.

The department has formed a new Technology Committee (Prof. Esteban Beita, chair) to focus on the current and future needs of all technology-related topics, including software and emerging technology access (e.g., VR equipment). The committee aims to identify and implement the latest relevant technologies necessary to assist learning and teaching, determine the order of magnitude for ongoing equipment maintenance, and find cost-effective and efficient maintenance and purchase options.

In December 2022, the department successfully hosted its first-ever fundraising campaign event, "Building Blocks". The event opened the school's doors to members of the AEC industry with a keynote speaker, Katie Swenson of MASS Design Group, student-led facility tours, and student work showcases. Led by the department's Steering Committee (Prof. Illya Azaroff, chair), the event raised over $45K to support the department's program and facility's needs. The event also formed a long-lasting partnership with the AIA Brooklyn chapter that co-hosted and planned the event. This forged relationship has since led to the hosting of an AIA Brooklyn-sponsored public lecture series in 2023-2024.

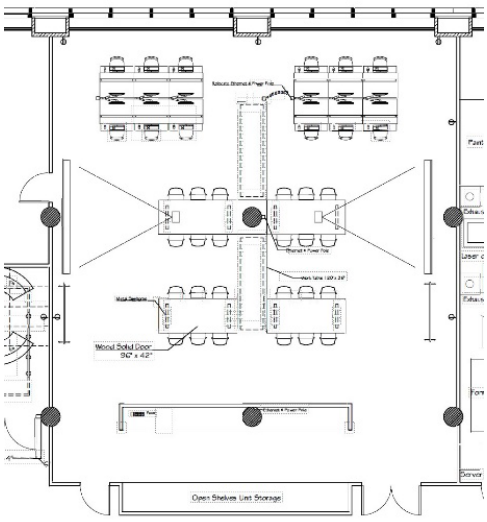
To encourage a more studio-based environment, the department has changed how it schedules classes. Sections of the same level design studios are now scheduled in the same classrooms when possible so that students feel a sense of ownership and camaraderie. Additionally, new storage units are being purchased so students can leave their supplies and models in the classrooms.



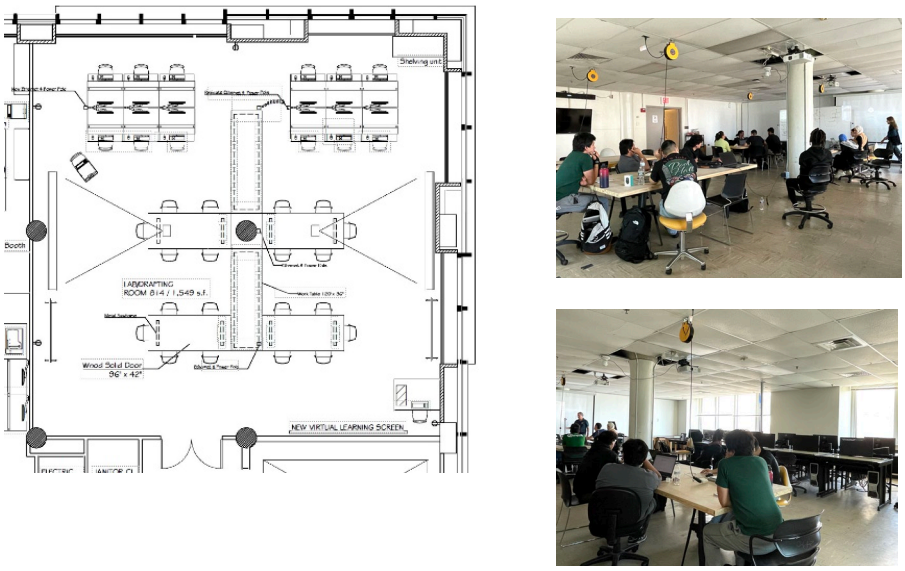
Plan and photos of V-205 and V-207

The second-floor classrooms (V-205 and V-207) were reconfigured at the beginning of Fall 2023 with movable desks to provide flexible forms of learning for the first-year students that can accommodate individual and group learning and encourage model making. This classroom configuration has proven effective, and the department plans to implement lessons learned from this adaptation.

This classroom configuration has proven effective, and the department has implemented a similar solution to the “double” classrooms on the eighth floor (V-812 and V-814). Two studio sections share a larger classroom supported by a large format lecture series for all sections, increasing increased exposure to peer-based learning and feedback and encouraging the exchange of teaching pedagogy between instructors, including joint pin-ups and reviews.



Plan and photos of V-812



Plan and photos of V-814

The recent Facilities Committee survey determined that most students work on their laptops and prefer flexibility. The department plans to move away from fixed workstation layouts by providing movable desks and chairs similar to those on the second-floor classrooms, working closely with the IT department to ensure adequate outlets and internet connections. The department also recognizes the need to maintain a handful of desktop computers to accommodate students who may be in-between laptops, unable to secure a laptop, or restricted from carrying a laptop due to their daily schedule, jobs, and commute. Based on the survey information, each "double" classroom will maintain eight to sixteen permanent workstations.

The department continues to look for solutions to provide more storage space for the students, including shelving in the first-year studios for model storage (submitted a request to the college to purchase and install shelving) and benches with integrated storage donation in Spring 2024. The benches are distributed in the eighth-floor hallway to create social space and personal storage spaces for the students. We are currently developing a system to distribute access to the students.

5.6.2 Space to support and encourage didactic and interactive learning, including lecture halls, seminar spaces, small group study rooms, labs, shops, and equipment.

Program Response:

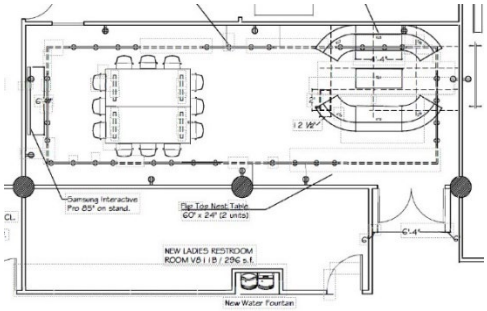
The department makes use of spaces across the campus to support student learning as described below:

New Academic Building: The New Academic Building is noteworthy because of the range of spaces and technology it makes available to faculty and students. It has a large one thousand-seat auditorium, a triple-height lobby with prime street front visibility, and one-hundred-person capacity breakout rooms and lounges. This building also contains varying-sized classrooms and is equipped with high-quality presentation equipment. The NYC DOB Scholars program holds its weekly meetings in this building. The department has utilized the classrooms for our multidisciplinary courses such as ARCH 3551- Sustainability: History & Practice. Final thesis reviews for the B. Arch students are held in the atrium of the New Academic Building.

Voorhes Theater: The Voorhees Theater is also a resource for the department. This theater holds approximately 200 people. The department has utilized this space for in-person town halls, multidisciplinary panel discussions that were a component of the FUSELab Intersections Symposia, and a lecture series sponsored by the Ornamental Metal Institute of NY.

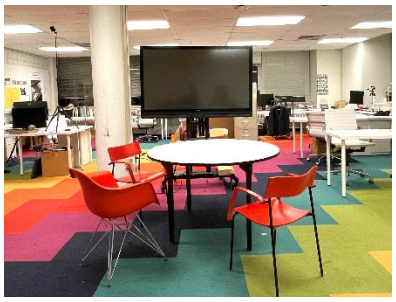
Woodshop: The department is provided access to a wood shop space located within the department of Construction Management and Civil Engineering Technology. Students in the department use this shared space occasionally, and this has contributed to a successful outcome for the TECHNE Gallery opening in Spring 2024, helping students make model stands and other installation components. The range of tools is limited, but the atmosphere is often inspiring as students meet others in different programs using similar tools and techniques. The Department of Entertainment Technology maintains a sophisticated wood shop in the Voorhees building. Architecture students or staff may utilize this periodically for special projects. The department's fabrication lab in V-813 is often shared with several departments. This interdisciplinary environment adds to students' enthusiasm when they can assist faculty and students in other departments with their projects.

Flexible Spaces for Collaboration: A flex space (V-811) gained from the recent renovation has become a student lounge. Students congregate and collaborate in the new lounge, self-manage the space, and maintain access during the building's operational hours.

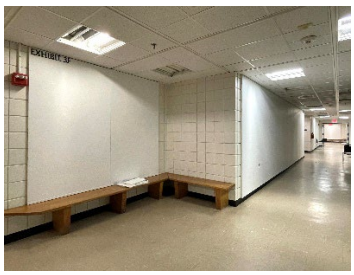


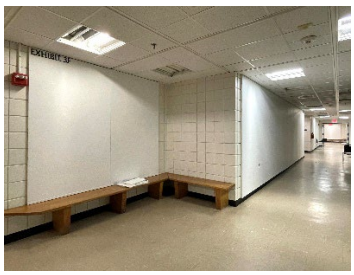
Plan and photos of V-811

The department has also identified several other opportunities in the existing spaces that can double as informal meeting and seminar spaces, including a round table in the open faculty office and the previous women's bathroom space, which it plans to transform into a centralized check-out kiosk for borrowed materials and equipment (including laptop loan – see 5.6.4).



Pin-up Space: Newly expanded pin-up spaces on the third floor are open for informal pin-ups to structured final reviews. As most first-year classes occur on the second and third floors, this addition will help foster studio culture and interactive learning early in the student's education. The department has also implemented a digital room/ pin-up wall booking interface to facilitate the needs of the class and students.





5.6.3 Space to support and encourage the full range of faculty roles and responsibilities, including preparation for teaching, research, mentoring, and student advising.

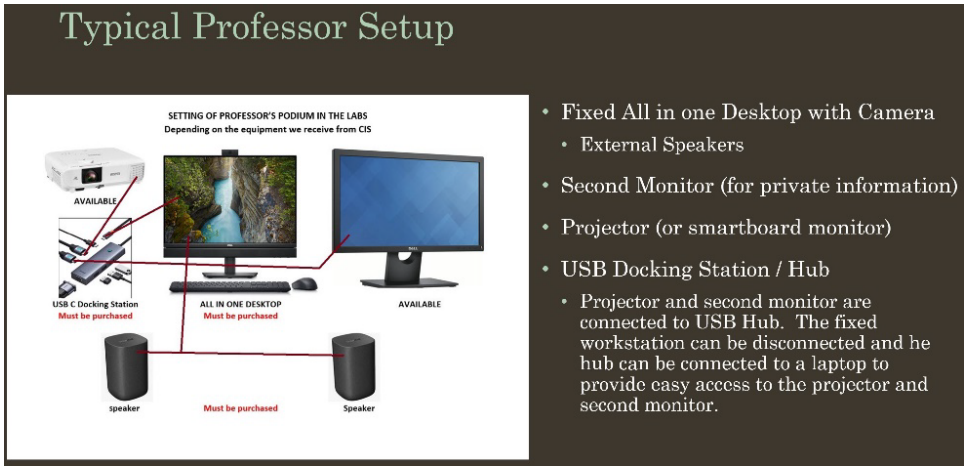
Program Response:

The department's open-plan faculty office in V-817 facilitates several student support activities, including student advisement, mentoring, and cross-pollination of research, through an open office environment that allows for informal conversation and easy collaboration. The space provides dedicated desks for the full-time faculty and hot desks and conference tables for all instructors. Workstations and a printing station help support the faculty, and the space has become a space for in-person meetings with colleagues and students.

The existing faculty offices on the eighth floor retain a small conference room for private meetings between faculty and students. There are a limited number of enclosed office spaces for faculty. The Director of Advisement was assigned a private office because of the need to counsel students with multiple academic and personal challenges.

The department chair's office was reconfigured to allow for increased intradepartmental meetings and interdisciplinary collaborations. It functions as a war room where faculty can quickly assemble to discuss and review various program initiatives on teaching, research, and mentoring. A large video monitor and webcam enable a range of meeting formats.

The Facilities Committee is looking into the classroom instructor station specs to ensure appropriate and effective access to teaching tools, including faculty laptops and access to educational software licenses.



5.6.4 Resources to support all learning formats and pedagogies in use by the program.

Program Response:

The college maintains active subscriptions to many software applications for faculty and students to support multiple learning formats. Primary instructional tools include OpenLab, an open online community for City Tech, and Brightspace, a “Learning Management system”. There are student general computer labs available for in-person usage in the Voorhees building and the Namm building. Computer labs in the architecture department are reopening for student usage in the spring semester. The Ursula C. Schwerin Library dedicates a librarian to collaborate with architecture faculty and staff to help build student research skills and connect with knowledge in their disciplines. The library maintains a range of architectural journals and books, including a subscription to the Material ConneXion. The department maintains a collection of books and reference materials for use by faculty and students. A digital tools library is also maintained in the front office, which includes CO2 meters, thermal cameras, and laser measure tapes. This equipment can be checked out by students for course specific usage.

The department continues supporting the laptop loan program. Each laptop has all the necessary software, and the students can check it out from the admin desk (soon to be moved to the dedicated check-out counter; see 5.6.2). This initiative provides all students with the required equipment, software, and online collaboration platforms regardless of financial barriers.

Recently completed ADA-compliant restrooms provide much-improved accessibility for the necessary amenities.

The department has secured dedicated IT personnel and more financial and physical resources to keep the Fabrication Lab open to pre-pandemic levels. The student support for model making and printing increased with more CLT (College Lab Technician) time. Lasers cutters, 3D printers, and a recently acquired plotter have been used widely in 2023-2024, fostering a studio culture of model making and in-person reviews. The department is looking into LCD monitors on wheels to provide flexible digital-based presentations.

The department continues to look for grants, donations, and fundraising opportunities. A recent material donation from AIA Brooklyn restocked the free and scrap model-making materials bin available to all students. The department is in the process of strategic planning to assess the best ways to distribute funds from the fundraising effort. However, it also recognizes the limitations of self-initiated programs and continues to ask for more support from the college that determines the budget. A recent letter to the Provost signed by all full-time faculty stresses the importance of the college's support in maintaining and updating the Fabrication Lab to serve our students' education and support the department's pedagogy.

If the program’s pedagogy does not require some or all of the above physical resources, the program must describe the effect (if any) that online, off-site, or hybrid formats have on digital and physical resources.

Program Response:

During the pandemic, a proof of concept, Virtual Desktop Infrastructure (VDI) system was successfully installed in one classroom’s workstations. Based on the success of this pilot, an expansion of the VDI was submitted, and as a part of Capital Funding, in the Fall of 2022, the department was able to implement the new Apporto VDI platform. The VDI system enables

students to access digital tools from any area outside of the classroom. It can activate informal campus spaces where students gather to work - with a full complement of studio software. It is a component of a forward-looking design studio that is not encumbered by desktop computers and cables. College CIS now centrally manages the VDI/Apporto system.

5.7 Financial Resources

The program must demonstrate that it has the appropriate institutional support and financial resources to support student learning and achievement during the next term of accreditation.

Program Response:

New York City College of Technology is a public institution of higher learning, as is the entire City University of New York system. It is supported by the State and City of New York utilizing tax levy funds, as well as revenue generated by tuition. The State and the City of New York have provided continuous legislative budgetary support.

The budget for the University is appropriated by the State and City. The State of New York is the principal funding source of the University, financing 46% of the fiscal year 2014 operating budget. Tuition revenue, which must be recognized and appropriated by the City and State, is the second largest source of funding, comprising 44% of the fiscal year 2014 operating budget. The City of New York finances the remaining 10% of the cost of operating. The University annually submits an operating tax-levy budget request to the State and the City that is comprised of both the mandatory, or base-line needs, and programmatic requests. The mandatory requests include contractual salary increases calculated by the colleges and other than personal service (OTPS) inflationary increases that are based on previous year expenditures plus an increase determined by the application of the Higher Education Price Index. It also includes requests for rent increases, fringe benefits, energy, and new building needs. The programmatic request is based on University Program initiatives outlined in the Master Plan and is developed by the University's central leadership in consultation with various CUNY constituencies, including members of the Board of Trustees, College Presidents, and faculty and student representatives.

The annual operating budget of the New York City College of Technology at the City University of New York is divided into four areas:

- Full- and part-time faculty salaries (PS)
- Other than personnel services (OTPS): the operating budget for general supplies/ laboratory materials replenishment, tools, office supplies, etc.
- Temporary services (TS); supports temporary administrative and teaching laboratory support personnel
- Tech Fee: a student fee which is used to provide computer software peripherals and other technical equipment and supplies that are used by students. Each year the department submits Tech Fee requests, which are reviewed by the Tech Fee Committee, which recommends funding.

The department relies on an annual Tech Fee fund to acquire, operate, and maintain digital equipment used by students and faculty. Major equipment expenses, greater than $50k, are supported by capital funding applications to the college. Both revenue streams advance or maintain core functions of the department and are subject to review by senior administrators with a consequent timeline for approval. Faculty make applications to both funds to advance their digital specialties or research involving software and hardware. They are encouraged to pursue grant funding as these monies accelerate the timeline for acquiring specialized equipment and/or staffing for implementation. The NSF ATE grant represents an example of this one-time enhancement to the core program. Grant funding is recognized as supplemental rather than essential to the regular advancement of technology and instruction within the department.

The Department of Architectural Technology continues to seek support outside of the college and the university. The department has pursued a larger visibility and professional community engagement through several ongoing initiatives, including hosting symposia, organizing student exhibitions at Borough Hall, hosting continuing education courses, inviting guest lecturers and jurors, and publishing and distributing our departmental journal, TECHNE. Our advisory board continues to offer the department important feedback and support continues from local, national, and international architects, engineers, and academics. We are currently in the process of reconstituting our advisory board, targeting members that can continue to advise but also raise additional funds and contribute resources to the department.

While the college has a formal alumni association, the department seeks to directly track our alumni. The department is building an alumni directory, using social media to communicate and track alumni, and administering surveys to better understand how our graduates are performing in traditional and nontraditional career paths. These efforts will continue and become more robust over the course of our candidacy, to build a better feedback loop for curriculum development and a database to track and analyze the performance of our graduates.

The college provides support for students and faculty by providing or facilitating scholarship, fellowship, and grant funding.

STUDENT SUPPORT:

- Office of Scholarships & Residency Services: The college provides scholarships and grants for eligible students based on academic merit and/or financial need. The college's Office of Scholarships & Residency Services provides a list of scholarships and grants available to students and the process and guidance to apply. The department has now established the Selldorf Architects Scholarship for architecture students. This scholarship provides up to one year of tuition for a selected student. The department's scholarship committee is working on a "Arch Tech Laptop Fund" to support students on the purchase of a laptop for college use. This fund is currently sponsored by contributions from CWB Architects.

- Emerging Scholars Program: Provides training and a stipend to students who conduct research with a faculty advisor.

FACULTY SUPPORT

- New Faculty Release Time: All new full-time faculty are granted 24 hours of release time, to be used periodically throughout the first 5 years on the faculty. This time facilitates professional development and scholarly activity as the new faculty member works towards tenure and promotion.

- Office of Sponsored Programs: Provides support for grant applications. The office maintains a rich website providing guidance on potential funding sources, grant writing, and the application process within the college. The office also hosts periodic workshops on grant writing.

- CUNY Internal Funding: The university provides faculty grants that support university initiatives as well as faculty research, including Interdisciplinary Research, Undergraduate Research (Research in the Classroom), and Faculty Travel for Research.

- PSC-CUNY Research Award Program: The Professional Staff Congress and the University use this funding to "support activities in the creative arts and all academic relevant research." This funding also supports curriculum development and improvement in teaching.

- Faculty Commons: Faculty Commons adopts a programmatic approach to professional development and operates as a faculty resource and think tank where members collaborate on a variety of projects to shape curriculum, pedagogy, and assessment. In accordance with the College goals and strategic plan and with support from CUNY, the Office of the Provost, the College Council and the Professional Development Advisory Council, Faculty Commons strives to improve and promote the quality and excellence of faculty at New York City College of Technology.

Descriptions of the expense and revenue categories over which the program has either control or influence:

Financial Resources	2020	2021	2022	2023
Instruction (FT + PT)	$2,269,417	$3,024,171	$3,449,633	$4,538,169
Capital	$0	$0	$0	$0
Overhead (Tech fee, OTPS, ProfTech)	$50,548	$3,057	$79,518	$166,594
Special Laptop Purchase			$110,000	
Revenue from all sources	$2,319,965	$3,027,228	$3,639,151	$4,704,763
Enrollment	2020	2021	2022	2023
AAS	170	163	155	178
Btech	514	486	544	556
BArch	15	84	64	75
	699	733	763	809
	Fall AIRE data	Fall Aire data	from 9/13CBIL	Fall AIRE data

Description of the scholarship, fellowship, and grant funds available for students and faculty:

Faculty

- Faculty fellowship leave available at 80% salary (every 7 years)
- PSC CUNY travel funds: $500 - $1,000
- PSC CUNY Research Award Program: $3,500 – $12,000 annually
- Professional Development Advisory Council (PDAC): $500 - $1000
- GRTI (Graduate Research Technology Initiative: $2,500 - $ 5,000
- Emerging Scholars Stipends for faculty: $1,000

Students:

- Departmental scholarships:
  - Annual Selldorf Scholarship: $7,000
  - Annual Laptop Grants: 3 @ $1,500
- LSAMP Louis Stokes Alliance for Minority Participation (NSF): $500
- Undergraduate Research Program: Honors & Emerging Scholars student stipends: $500
- Undergraduate Research Program: CUNY Research Scholars Program: $5,000 annually
- Petrie student emergency funds: variable
- Financial aid and federal work study awards: variable based on need

Upcoming Changes

- There are no immediate changes to enrollment anticipated.
- There are no changes planned for any pending reductions or increases in funding.
- There are no changes planned in funding models for faculty compensation, instruction, overhead, or facilities since the last visit.

5.8 Information Resources

The program must demonstrate that all students, faculty, and staff have convenient and equitable access to architecture literature and information, as well as appropriate visual and digital resources that support professional education in architecture.

Program Response:

CUNY's library system is a federation of 28 libraries and the CUNY Central Office of Library Services (OLS), which supports the university's libraries so that they may better serve students and faculty. At each college, the library plays a major role in supporting academic programs, teaching, and learning, and facilitating the curricular and research activities of faculty and students.

CUNY faculty and students may use and borrow materials from any of the University's libraries regardless of their college affiliation. CUNY's libraries also lend devices, such as laptops, calculators, and digital cameras, to support student work. CUNY's ILL (Inter Library Loan) Program expands the availability to materials at participating non CUNY colleges.

The Ursula C. Schwerin Library at New York City College of Technology is integral to the educational mission of the college, and fosters connections with and supports students, faculty, and staff in their academic pursuits. It is located on 300 Jay Street, a short 5-minute walk from Voorhees Hall on 186 Jay Street, where Architectural Technology courses are held and where academic departments in the School of Technology and Design are housed.

Library faculty and staff are committed to student success as we implement and acquire those services and resources that will have the greatest positive impact on the diverse City Tech community. The library offers physical and online access to academic resources, information technology, and study space. Our collections provide students with opportunities for intellectual exploration, and library faculty empower students to find and critically evaluate information and its uses. As members of an academic department in the college, library faculty research, innovate, and lead on issues in library and information studies, scholarly communications, instructional technology, pedagogy, and higher education.

The Ursula C. Schwerin Library is home to a range of resources directly related to Architecture including the Multimedia Center as well as access to: Applied Science and Technology Source, Art Full Text: Wilson, Art Museum Image Gallery, ARTstor, Avery Index to Architectural Periodicals, Bibliography of the History of Art, ebray, GreenFILE, Humanities Source, JSTOR journals, Material ConneXion, Oxford Art Online, Oxford Reference and SpringerLink Ebooks. Additionally, the department maintains a collection of books, reference materials, materials samples and product resources for use by faculty and students.

Further, the program must demonstrate that all students, faculty, and staff have access to architecture librarians and visual resource professionals who provide discipline-relevant information services that support teaching and research.

Program Response:

All academic departments at the New York City College of Technology have a professional librarian with disciplinary subject expertise who serves as a designated liaison. The library liaison for the Architectural Technology department consults regularly with Architecture faculty about monograph and media acquisitions and conducts regular outreach to promote library services, programs, and resources. The library Architectural Technology liaison also provides subject specific research instruction (in person and remotely) for the department, creates virtual instructional content to support student research, and is available for one-on-one research consultations with Architecture students throughout the academic year.

Access
The Ursula Schwerin library at the New York City College of Technology (City Tech) is part of the CUNY consortia library system, comprised on 31 libraries on 25 campuses located in New York City. Enrolled students at City Tech can borrow books from all lending collections across CUNY and have print materials transferred to different campuses. City Tech students have physical access to all libraries, on-site access to e-resources at all campuses, and both on-site and virtual access to City Tech e-resources. Additionally, students can request monographs, book chapters, and articles from external institutions to support their research through the library's Interlibrary Loan service.

Collections (see below)
The library has 2,115 print monographs and 1,497 e-books under LOC classification code NA. We have access to 12 of the fundamental AASL core periodicals as well as a number of recommended and topical journals. The appended table details the extent and format of Architecture collections including monographs, multimedia, and AASL periodicals available at City Tech. Consortia resources available through the CUNY system and historic and visual resource collections available through the New York Public Library supplement these local holdings.

Titles with Classification Code NA

Resource Type	Num of Titles (Active)
Book - Electronic	1,497
Book - Physical	2,115
Journal (Ceased publication) - Electronic	4
Journal (Ceased publication) - Physical	5
Journal - Electronic	21
Journal - Physical	9
Monographic component part - Physical	1
Other Serial (Ceased publication) - Electronic	1
Other Serial (Ceased publication) - Physical	3
Other Serial - Electronic	3
Other Serial - Physical	8
Other material - Electronic	3
Projected medium - Physical	40

Title	ISSN	Holdings	Type
A+U : Architecture & Urbanism = Kenchiku to toshi	0389-9160	Print: no.344 (1999)	Fundamental
Abitare	0001-3218	Print: Bound no. 447(2005:Feb.)-465 (2006:Oct.)	Fundamental
Architect : the magazine of the American Institute of Architects	1935-7001	Electronic: 2007-present Print: Bound: v.95 (2006:Nov.)-v.96 (2007)	Fundamental
l'Architecture d'Aujourd'Hui	0003-8695	Print: (2001) V4. V.7	Fundamental
Architectural Design (AD)	0003-8504	Electronic: 2005; 2001-2021 Print: v.63:pt.9/10 (1993), v.67:no.11/12 (1997:Nov. /Dec.), v.70:no.2-4 (2000), v.72:no. 6 (2002:Nov. /Dec.), v.73:no.1 (2003:Jan./Feb.), v.73:no.5 (2003: Sept./Oct.), v.74:no.4 (2004:July/Aug.), v.75:no.3 (2005:May/June)	Fundamental
Architectural Review	0003-861X	Electronic: 1994-present	Fundamental
El Croquis	0212-5633	Print: v.83, 88-89, 91-93 (2005)	Fundamental
Domus	0012-5377	Print: Bound: no.756 (1994:Jan.)-777 (1995:Dec.); Bound: no. 899 (2007:Jan.) -908 (2007:Nov.)	Fundamental
GA Houses	monographic series	Print: v.48 (Project 1996)	Fundamental
Journal of Architectural Education (JAE)	1046-4883	Electronic: 1984-2014	Fundamental
Journal of Architectural and Planning Research	0738-0895	Electronic: 1984-2018	Fundamental
Landscape Architecture	0023-8031	Print: Bound: v.73 (1983)-v.101 (2011)	Fundamental
Architects' Journal (AJ)	0003-8466	Electronic: 1997-present	Recommended
Dwell	1530-5309	Print: v.16 (2016)- in current Periodicals	Recommended
Energy and Buildings	0378-7788	Electronic: 1995-present	Recommended
Footprint : Delft School of Design Journal	1875-1504	Electronic: 2007-2011	Recommended
Future Anterior: journal of historic preservation history, theory & criticism	1549-9715	Electronic: 2004-present	Recommended
Journal of Interior Design	1071-7641	Electronic: 1997-present	Recommended
Metropolis	0279-4977	Electronic: 2008-present	Recommended

		Print: Bound v.25 (2005:Aug.) - v.28 (2008:Dec.)	
Muqarnas	0732-2992	Electronic: 1993-2008	Recommended
Nexus Network Journal: architecture and mathematics	1590-5896	Electronic: 1999-present	Recommended
Werk, Bauen + Wohnen	0257-9332	Electronic: 1980-present	Recommended
APT Bulletin	0848-8525	Electronic: 1986-present	Topical
ARQ (Chile)	0716-0852	Electronic: 2005-2011	Topical
Arris	1048-5945	Electronic: 2013-2020	Topical
Buildings & Landscapes: Journal of the Vernacular Architecture Forum	1936-0886	Electronic: 2007-present	Topical
Fine Homebuilding	1096-360X	Print: no. 272-288 (2018-2020)	Topical
Garden History	0307-1243	Electronic: 1972-2018	Topical
Home Cultures	1740-6315	Electronic: 2004-2010	Topical
Interior Design	0020-5508	Electronic: 1984-present	Topical
Journal of Architectural Engineering	1076-0431	Electronic: 1995-2014	Topical
JSSAC: Journal of the Society for the Study of Architecture in Canada	1486-0872	Open Access	Topical
Metu Journal of the Faculty of Architecture	0258-5316	Electronic: 2010-present	Topical
Old-House Journal	0094-0178	Electronic: 1975-2019	Topical
Places	0731-0455	Open Access	Topical
Techne (Florence): journal of technology for architecture and environment	2239-0243	Electronic: 2011-present	Topical
Vernacular Architecture	0305-5477	Electronic: 2005-present	Topical
West 86th: a journal of decorative arts, design history, and material culture	2153-5531	Electronic: 2011-present	Topical
Architecture Philosophy	2372-0883	Open Access	Titles to watch

Staff and Support Services

The Ursula Schwerin Library is staffed by 12 full time professional librarians with faculty status,5 part time library professionals, and a team of IT and technical support staff. One full time librarian is the department liaison for the Architecture department and is responsible for purchasing monographs and multimedia in this area, maintaining access to and promoting relevant electronic resources, creating virtual instructional content including tutorials and research guides, conducting information literacy instruction, providing one-on-one reference support to students (in person and remotely), and providing curricular and scholarly publishing support to faculty.

Space and Hours

The library occupies two floors of a building complex. On one level it contains a large open study area with computers, service desks, and periodicals / reserves / reference collections; the upper level contains print lending collections and individual study carrels devoted to silent study as well as 5 group study rooms. There are two adjacent computer labs off of the library. During the academic year, the library is open Monday-Thursday from 9-9pm, Fridays 9-7pm and Saturdays

from 10-5pm. During these hours students can get one-on-one research help from a librarian. We also offer 24X7 research support remotely through a staffed chat service.

Disruption of Service
City Tech Librarians are able to support students and faculty remotely should a problem occur that does not allow for physical access to the collection. Most Architecture periodicals in our collection are available electronically and we primarily provide access to visual resources and maps digitally through subscription databases and public library digital collections. During the pandemic, when many of our physical collections were unavailable, we piloted a controlled digital lending program to provide access to canonical digitized books in our collection and offered book chapter scanning services through Interlibrary Loan. During the pandemic we also offered virtual office hours for architecture students and conducted library instruction online in addition to virtual chat reference services.

6—Public Information

The NAAB expects accredited degree programs to provide information to the public about accreditation activities and the relationship between the program and the NAAB, admissions and advising, and career information, as well as accurate public information about accredited and non-accredited architecture programs. The NAAB expects programs to be transparent and accountable in the information provided to students, faculty, and the public. As a result, all NAAB-accredited programs are required to ensure that the following information is posted online and is easily available to the public.

6.1 Statement on NAAB-Accredited Degrees

All institutions offering a NAAB-accredited degree program or any candidacy program must include the exact language found in the NAAB Conditions for Accreditation, 2020 Edition, Appendix 2, in catalogs and promotional media, including the program's website.

Program Response:

All NAAB related information can be found here:
http://www.citytech.cuny.edu/architectural/accreditation.aspx

6.2 Access to NAAB Conditions and Procedures

The program must make the following documents available to all students, faculty, and the public, via the program's website:

a) Conditions for Accreditation, 2020 Edition
b) Conditions for Accreditation in effect at the time of the last visit (2009 or 2014, depending on the date of the last visit)
c) Procedures for Accreditation, 2020 Edition
d) Procedures for Accreditation in effect at the time of the last visit (2012 or 2015, depending on the date of the last visit)

Program Response:

These documents can be found here:
http://www.citytech.cuny.edu/architectural/accreditation.aspx

6.3 Access to Career Development Information

The program must demonstrate that students and graduates have access to career development and placement services that help them develop, evaluate, and implement career, education, and employment plans.

Program Response:

Links to the resources listed below can be found here:
http://www.citytech.cuny.edu/architectural/accreditation.aspx

NCARB Certification Guidelines
AIAS Studio Culture
Emerging Professional's Companion
National Council of Architectural Registration Boards (NCARB)
American Institute of Architects
American Institute of Architecture Students
Association of Collegiate Schools of Architecture

6.4 Public Access to Accreditation Reports and Related Documents

To promote transparency in the process of accreditation in architecture education, the program must make the following documents available to all students, faculty, and the public, via the program's website:

a) All Interim Progress Reports and narratives of Program Annual Reports submitted since the last team visit
b) All NAAB responses to any Plan to Correct and any NAAB responses to the Program Annual Reports since the last team visit
c) The most recent decision letter from the NAAB
d) The Architecture Program Report submitted for the last visit
e) The final edition of the most recent Visiting Team Report, including attachments and addenda
f) The program's optional response to the Visiting Team Report
g) Plan to Correct (if applicable)
h) NCARB ARE pass rates
i) Statements and/or policies on learning and teaching culture
j) Statements and/or policies on diversity, equity, and inclusion

Program Response:

Links to the documents listed below can be found here:
http://www.citytech.cuny.edu/architectural/accreditation.aspx

NAAB City Tech 2025, Architecture Program Report (APR) Continuation of Accreditation
NAAB City Tech 2022, Initial Accreditations Letter
NAAB City Tech 2022, Continuing Candidacy Visiting Team Report (VTR)
NAAB City Tech 2022, Architecture Program Report (APR) Initial Candidacy
NAAB City Tech 2020, Continuing Candidacy Visiting Team Report (VTR)
NAAB City Tech 2020, Architecture Program Report (APR) Continuation of Candidacy
NAAB 2021, Letter of Continuation of Candidacy
NAAB City Tech 2018 Initial Candidacy Visiting Team Report (VTR)
NAAB City Tech 2017 Architecture Program Report Initial Candidacy (APR)
NAAB 2018, Letter of Initial Candidacy
Statements and/or policies on learning and teaching culture- See Course/ Policy Menu Link
Statements and/or policies on diversity, equity, and inclusion-See Course/ Policy Menu Link

6.5 Admissions and Advising

The program must publicly document all policies and procedures that govern the evaluation of applicants for admission to the accredited program. These procedures must include first-time, first-year students as well as transfers from within and outside the institution. This documentation must include the following:

a) Application forms and instructions
b) Admissions requirements; admissions-decisions procedures, including policies and processes for evaluation of transcripts and portfolios (when required); and decisions regarding remediation and advanced standing
c) Forms and a description of the process for evaluating the content of a non-accredited degrees
d) Requirements and forms for applying for financial aid and scholarships
e) Explanation of how student diversity goals affect admission procedures

Program Response:

a) First-year and transfer students must apply to CUNY and be accepted to City Tech prior to applying to the B. Arch program. Once they have been accepted by City Tech students must then complete a supplemental application to apply to the B. Arch program.

- Link to the City Tech application instructions: https://www.citytech.cuny.edu/admissions/index.aspx#how-to-apply
- Link to the CUNY application form and instructions: https://www.cuny.edu/admissions/undergraduate/apply/cuny-application/
- Link to the B. Arch application form and instructions: https://www.citytech.cuny.edu/architectural/architectural-B. Arch.aspx#

b) Admission requirements and evaluation processes can be found on our website: https://www.citytech.cuny.edu/architectural/architectural-B. Arch.aspx#-

c) A description of the process for evaluating the content of a non-accredited degrees can be found on our website: https://www.citytech.cuny.edu/architectural/architectural-B. Arch.aspx#-

d) Requirements and forms for applying for financial aid and scholarships https://www.citytech.cuny.edu/financial-aid/

e) Explanation of how student diversity goals affect admission procedures https://www.citytech.cuny.edu/catalog/informations.aspx?Cat_ID=1019

6.6 Student Financial Information

6.6.1 The program must demonstrate that students have access to current resources and advice for making decisions about financial aid. **Program Response:**

Each college of The City University of New York is required to receive from each admitted student a non-refundable tuition deposit of $100 before the student will be permitted to register. Veterans, Special Programs students (including SEEK) and students whose Free Application for Federal Student Aid (FAFSA) shows an effective family contribution (EFC) of $3,000 or less will be exempt from the deposit requirement.

Resident Students
Full-time matriculated: $3,465 per semester
Part-time matriculated: $305 per credit
Online Degree Program: $305 per credit
Non-degree: $445 per credit (no limit)
Senior citizen fee: $65 per semester or session

All Non-Resident Students
Full-time matriculated: $620 per credit
Online Degree Program: $350 per credit
Part-time matriculated: $620 per credit
All Non-degree: $915 per credit (no limit)

Complete up to date financial costs can be found at:
http://www.citytech.cuny.edu/admissions/tuition-general.aspx

6.6.2 The program must demonstrate that students have access to an initial estimate for all tuition, fees, books, general supplies, and specialized materials that may be required during the full course of study for completing the NAAB-accredited degree program.

Program Response:

This information can be found here:
https://www.citytech.cuny.edu/architectural/architectural-B. Arch.aspx