

**Making the Connection between Education and the Labor Market: A Case for Work-
Based Learning for New York City's Public High School Students**

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I. Summary Recommendation

As children progress through the K-12 grades they are often asked what they would like to be when they grow up, but there are few opportunities for exposure to real world work experiences while they are in school. Each junior or senior in New York City's public high schools should have access to work-based learning opportunities to guide and inform their postsecondary plans which will help young people gain meaningful employment. First, to accomplish this goal, college and career readiness must be redefined to dismantle the dichotomy that there are separate academic and non-academic pathways for students. Second, along similar lines, New York State's learning standards for Career Development and Occupational Studies (CDOS) and work-based learning programs should be acknowledged and destigmatized through a public media campaign. Recognizing the challenge of changing the state's graduation requirements to include work-based learning, the incoming Mayor of New York City should take the helm and pioneer a large work-based learning effort for high school students to "demystify access" (Banks, 2021) to well-paying jobs and prepare students for future labor market demands.

II. Statement of the Problem

Nonintegrated definitions of College and Career Readiness reinforce a dichotomy of academic and non-academic pathways for students.

Although the New York City Department of Education's (NYC DOE) goal is to "ensure all students graduate from high school ready for college and the 21st-century workforce," definitions of college and career readiness are largely skewed towards college readiness and exclude many students who will not go to college due to external circumstances or personal choice (NYC DOE, n.d). In New York City's public schools, the definition of college and career readiness has been tied to arbitrary cutoff scores on the English Language Arts and math Regents

examinations to signal success in first year college courses. In 2013 Commissioner of Education Dr. John B. King Jr. listed the domains of college and career readiness as core academic knowledge and skills, key behaviors and attitudes, and career-specific knowledge and skills (New York State Education Department (NYSED)). The latter component has been understated and underenforced in New York City's K-12 public schools which leaves students less prepared for 21st-century labor demands even if they do attend and graduate college. The CTE Technical Assistance Center of New York has advocated for a clearer definition of career readiness that is "commonly understood, endorsed, and applied as well as conveyed with college readiness" (2012, p. 9). Career readiness is less integrated in the definition of "college and career readiness" which negatively affects the implementation of its standards across the board.

New York City is the largest school district in the United States serving over 1 million students including students in public charter schools. As such, New York State and New York City are equipped with existing infrastructure and resources that can be used to improve how students experience and prepare for careers in high school. New York State's learning standards for Career Development and Occupational Studies (CDOS) systematically outline key ideas, performance indicators and sample tasks for students at the elementary, intermediate and commencement grade levels to demonstrate readiness for entry-level employment. The standards are 1) Career Development, 2) Integrated Learning, 3a) Universal Foundation Skills, and/or 3b) Career Majors. On NYSED's website, these standards are listed separately from the academic learning standards in core subjects like English Language Arts, mathematics, science, and economics and government.

In recent years, there has been a growing interest in the use of CDOS to boost high school graduation rates for students. In the spring of 2015, the NYSED removed the second social

studies Regents examination requirement “to afford students greater choice in their fifth assessment requirement” (NYC DOE Office of Academic Policy and Systems, 2021, p. 25). In the following spring, the New York State Board of Regents amended sections 100.5 and 100.6 of the Regulations of the Commissioner of Education to establish the “4+1 Pathway” to graduation (Infante-Green, 2016, p. 1). The “multiple pathways recognize the importance of engaging students in rigorous and relevant academic programs” that include Arts, World Languages, Humanities, STEM, Career and Technical Education, and CDOS (NYSED, n.d.). Under the “4+CDOS” categorization, CDOS is perceived as a “rigorous and relevant *academic* [emphasis added] program.” Before this change, CDOS was an option available only to students with disabilities as an endorsement to their high school diplomas or as a standalone credential if they were unable to earn a diploma (Infante-Green, 2016, pp. 1-2). CDOS gained legitimacy as an academic program when it became a pathway for graduation for all students. However, CDOS still carries the stigma of being for students who cannot pass a fifth Regents exam, have disabilities, or are not college bound, and hence, it is considered a less rigorous option. Here to Here, a Bronx-based non-profit organization that connects high school students with employers and community-based organizations, has recommended the rebranding of CDOS “as a preparatory credential for all students” (2019, p. 11). If CDOS is brought to the mainstream as suggested, public education officials can begin to dismantle the stigma that career readiness is the non-academic route for underprepared students. After all, CDOS is part of New York State’s learning standards, and its legitimacy is overdue.

High school students do not see the connection between school and work.

New York State defines work-based learning (WBL) as “authentic learning experiences that allow students to explore their career goals, abilities and interests while applying their academic

and technical knowledge and skills in a real-world context” and is “planned and supervised by instructional staff in collaboration with business, industry, or community partners” (2021, p. 2). WBL or “work-linked learning” as Harvard Graduate School of Education’s report, *Pathways to Prosperity* (2011), calls it, is an opportunity for students to obtain both hard and soft skills that will enable them to gain meaningful employment regardless of the postsecondary pathway they take. *Pathways to Prosperity* identified “growing evidence of a ‘skills gap’ in which many young adults lack the skills that pay a middle-class wage” (Symonds et al., p. 1). Previously in 20th century America, a high school diploma and on-the-job training was enough to be a “passport to the American Dream” (p. 2). In 21st century America, postsecondary credentials are increasingly essential for young adults to succeed in their careers and earn more (Carnevale et al., 2021, p. 16).

The purpose of WBL is not to foment division between non-college bound and college bound students. All high school students can benefit from WBL. Social perceptions have labeled WBL as an option only for non-college bound students seeking immediate employment, but the reality is that even college bound students need work experience. As previously mentioned, college readiness is currently associated with possessing the necessary academic knowledge and skills to be successful in first year college courses. As the *Pathways to Prosperity* report pointed out in 2011, the “college-for-all rhetoric... needs to be significantly broadened to become a ‘post highschool credential for all’ because “only about 4 in 10 Americans have obtained either an associate’s or bachelor’s degree by their mid-twenties” (p. 6). A decade later, the Center on Education and the Workforce highlighted that the college-for-all approach is not the ‘be-all and end-all’ since “only 52 percent of high school sophomores attain a postsecondary credential within 10 years” (Carnevale et al., 2021, p. 16). In other words, being college ready does not

guarantee college retention, graduation, or even gainful employment despite there being both a rhetorical and real premium on college education. The ideal situation would be for all high school graduates to be prepared for entry-level careers no matter the postsecondary route they pursue.

III. Policy Recommendation

The New York State Education Department and New York City Department of Education must clearly articulate a unified and integrated definition of College and Career Readiness.

As they currently exist, definitions of college and career readiness vary across the federal, state, and local levels. These definitions read more like college *or* career readiness. They focus heavily on academic preparedness for college-level school work and delineate separate avenues for students that are not considered college ready or college bound. To deliver an education that will ensure all students will be equipped for their postsecondary education plans and prepared to enter the 21st century labor force, the NYSED and NYC DOE must have a balanced definition of college and career readiness. In a 2012 white paper, the CTE Technical Assistance Center (CTE TAC) of New York which supports the NYSED with “improving the quality, access, and delivery of Career and Technical Education” (p. 2) proposed its own definition of college *and* career readiness to improve current definitions:

To be college and career ready, all students in NY should have preparation in the three major skill areas of core academic skills, employability skills, and technical skills, which will allow them to transition seamlessly into a career and/or a postsecondary credentialing program (e.g., industry training, apprenticeship, licensure, community or four-year college). In order to make this happen, students should: develop a college and career plan with academic core requirements and course choices appropriate to the plans,

explore and understand the academic and technical skill requirements for one of the 16 career clusters, possess the specific academic skills appropriate for and foundational to the career cluster to be able to apply academic skills in situations aligned to an increasingly sophisticated workplace and society (p. 4).

The NYSED and NYC DOE can use CTE TAC's proposed definition as a model and the learning standards for CDOS to create a more integrated definition of college and career readiness that works for all students. When this definition is clearly articulated, schools can begin to prioritize students' "exposure of career pathways based on labor market realities and opportunities to exposure to these realities" (p. 8).

Destigmatize Career Development and Occupational Studies (CDOS) and Work-Based Learning (WBL) through a public media campaign.

When CDOS became an eligible pathway for high school graduation in lieu of a Regents examination through the "4+1 Pathway" option, it was recognized as a "relevant academic program." To change the public perception that career development programs are non-academic, New York City should begin marketing CDOS and WBL opportunities as academic programs just as the core subjects of English, math, science, and social studies are. Connections between work and learning should be made. Only when career readiness is afforded the same primacy as academics will educational priorities shift. A public media campaign would provide a much-needed platform for CDOS and WBL to be rebranded as academic programs that are beneficial for all students.

Adopt Work-Based Learning (WBL) as a graduation requirement to ensure all high school students have exposure to real-world work experience.

In his acceptance speech, Mayor-elect Eric Adams envisioned his administration as one that is committed to supporting children from “cradle to career” and “birth to profession” by partnering with the biggest corporations in New York City to provide paid internships, or WBL opportunities, for students in underserved communities (CBS New York, 2021). David C. Banks, President and CEO of The Eagle Academy Foundation, Inc., and likely candidate for the New York City’s Schools Chancellor position, writes:

Corporate and government partners must be leveraged to broaden student exposure opportunities. Our students will be what they see; it is much easier to imagine becoming an investment banker if you have actually met one. With additional resources, we can create model experiences that activate the power of possibility... These are the kinds of opportunities that inspire students by demystifying access to the industries that will shape their future (New York Daily News, 2021).

Without mentioning existing CTE and vocational schools, New York City has niche examples of programs that offer WBL to specialized groups of students. The Learning to Work initiative “offers paid internships, student support services, in-depth job readiness and career exploration activities” for students in transfer schools and Young Adult Borough Centers (YABC) (NYC DOE, n.d.). There are 56 transfer schools across New York City, including 7 charter schools (Fruchter & Mokhtar-Ross, n.d.), and 23 schools offering YABC (NYC DOE, n.d.). Learning to Work began under Mayor Bloomberg’s administration to help reengage students and address the high school drop-out crisis. Funding for this initiative is constantly under threat, as was evidenced by the COVID-19 pandemic. Due to an influx of federal dollars, the NYC DOE’s *Updates on American Rescue Plan* pronounced the temporary restoration of \$30 million to the Learning to Work program. In the updates, it categorized Learning to Work as an “enrichment”

program that by definition is deemed as non-essential or less important than academic programs. Another example of small programs that support WBL are Transition and College Access Centers (TCACs) for students with Individualized Education Programs (IEPs). TCACs have an office in each of the 5 boroughs. They are “student-centered resource hubs that offer trainings, workshops, and opportunities that provide the tools needed to plan for adult life” and successfully transition from high school to life after high school (NYC DOE, n.d., p. 24). TCAC only offers resources to students with disabilities, but the transition from youth dependence to adult independence is taking longer for all students (Carnevale et al., 2021, p. 8).

An optimal way to ensure every high school student has participated in a WBL opportunity before they complete 12th grade is by making it a graduation requirement as opposed to an option. In July 2019, the Board of Regents and then-Chancellor, now Commissioner of Education and President, Betty A. Rosa, announced the creation of a Blue Ribbon Commission to review the state’s graduation requirements (NYSED, *Fact Sheet*, 2021). Currently, there is traction from parents, students, and educators alike to remove the stringent Regents examination requirements and replace them with performance-based assessments to give students greater flexibility and creative freedom to showcase what they have learned. Now that the state graduation requirements are currently under review and there is a movement away from high stakes standardized testing towards performance and project-based learning, there is a possibility for work-based or work-linked learning to meet that need. New York State already has the CDOS learning standards in place to maintain and ensure academic rigor. It also has a manual that thoroughly outlines logistical expectations for the structure of WBL programs.

For every high school junior and senior to have access to internships, apprenticeships, or other forms of WBL, the school district must have robust partnerships with employers. City

agencies may be one avenue that can offer slots for students to establish connections between school and work. City agencies span various fields from education, environment, government, health, human services, housing, infrastructure, law, finance, public safety, to transportation. There must be a mutually beneficial agreement negotiated between the unions that represent the employees in these city agencies, and the NYC DOE. Schools could also partner with the City University of New York (CUNY) to offer academic credit to students participating in WBL at their sites like the structure of its CollegeNow program. Community-based organizations could facilitate WBL opportunities to students via after school programming and the Summer Youth Employment Program (SYEP), which just received \$13 million to fund 5,000 more slots for college students at CUNY (2021, schools.nyc.gov). High school students will be able to complete WBL during student advisory and mentoring courses, expanded learning time, summers or even during the longer school days Mayor-elect Adams has proposed. Ideally, internships would be paid, but the WBL manual also has examples of programs that offer unpaid internships. Both Mayor-elect Adams and David C. Banks have alluded to asking corporate partners to hire paid high school student interns.

According to the WBL manual, internship placements are agreements between school districts and local business partners (p. 21). As a result, the NYC DOE should facilitate the relationship between schools and employers. This would require an office and staff designated with the task of brokering formal partnerships between high schools across New York City's 32 districts and external partners. This responsibility goes beyond securing partnerships. The NYC DOE should create an independent oversight committee that would be responsible for vetting potential partners and ensuring their missions are aligned with equitable practices to prevent the funneling of students into stratified pathways of WBL. The selection of partners should keep

pace with the labor market's changing landscape to cultivate the soft and hard skills that are in high demand. At the macro-level, the NYC DOE is the intermediary between schools and employers. On the micro-level, the Work-Based Learning Coordinator, a teacher with the WBL extension #8981 and/or #8982, is the intermediary between students and employers. The WBL manual explains that the coordinator is allowed to supervise between 12-25 students at a time (p. 23). To carry out extensive WBL programs, there will need to be more teachers with the proper WBL extension.

IV. Budget

In the summer of 2021, Mayor Bill de Blasio and Chancellor Meisha Porter announced a breakdown of the Academic Recovery Plan for fiscal year 2022. One of the focus areas for the funds is preparing students “whether heading to college or a career” (schools.nyc.gov). The \$10 million are being allocated to:

Free, afterschool, personalized college counseling for every junior and senior.

Universal College Financial Aid Guidance to help navigate the application process, available in multiple languages.

48 new remote AP college-prep courses.

College Now restoration to serve 22,000 students from all high schools in dual enrollment, college-credit courses across 18 CUNY campuses.

Immigrant Ambassador Programs across 30 high schools that match immigrant DOE students with college students to foster mentorship and early college awareness.

Student Success Centers for 34 high schools to ensure post-grad plans for all students, and expanding the Postsecondary Readiness for ELLs Program (PREP), to be facilitated by a select group of school counselors and educators (schools.nyc.gov, 2021).

This current list is to prepare students to be college ready, not college *and* career ready. I propose that a portion of the \$10 million be redirected towards redefining college and career readiness, creating a public media campaign to destigmatize CDOS and WBL, and providing WBL for high school juniors and seniors. \$10 million is a drop in the \$635 million Academic Recovery Plan.

V. Arguments Against Policy Solution

Career development programs are not rigorous enough and only track students into 'dead-end' jobs.

Because of the pronounced emphasis on academic benchmarks in core subjects and the inadequate definitions of college and career readiness, most people with a stake in K-12 education may be unaware of New York's extensive Career Development and Occupational Studies (CDOS) learning standards. Guidance counselors in high schools may be more familiar with the standards to guide students to meet the requirements for the "4+CDOS" option to graduate. In the recommended public media campaign, it must be continuously accentuated that CDOS is endorsed by the NYSED as the learning standards for career readiness across grades K-12. The public must be informed and reminded that career development programs aligned with the state's standards are both legitimate and rigorous.

On the other hand, concerns that the "4+CDOS" option is showing early signs of tracking students must be considered. Due to the troubling history of CTE, vocation and trade schools, families may be inclined to be distrusting towards career readiness programs and WBL. In the past, students of color from low-income backgrounds "were often tracked into vocational programs that steered them away from college and into jobs that offered few or no opportunities for advancement" (Lewy, 2021). In an article published by *Chalkbeat*, Monica Disare highlighted The Education Trust-New York's findings that black students were

“disproportionately more likely to use an evaluation meant to test entry-level work skills on their way to graduation” and “low-income students [were] twice as likely to use new graduation options to earn a less challenging diploma than their more affluent peers” (2018).

Here it may be useful to explain a couple of things: 1) The “4+1 Pathway” awards high school students the same Regents diploma as any other student who passed the required 5 Regents examinations. 2) Students have two options for how they can earn the CDOS credential to graduate either with an endorsement to their diploma or the “4+CDOS” pathway. Here to Here and I advocate for the first option which entails the completion of a specified number of hours of WBL following the WBL manual’s guidelines, an annual career plan, an employability profile, and an exit summary upon graduation (NYSED, 2018, p. 3). The second option, which Disare references in her article, is meeting the requirements of an exam approved by the NYSED that is based on “nationally recognized work readiness credentials” in lieu of completing the hours of WBL experiences and other career planning activities outlined in the first option (p. 5). These exams are also associated with a fee (p. 20). Taking an alternate assessment to test work readiness eludes the purpose of WBL and does students a disservice by depriving them of the opportunity to explore careers. The reason why many underprivileged students choose the second option is because “the coursework necessary to offer these new pathways is not always present in the city’s most struggling schools” (Disare, 2018). Making WBL a requirement should not be a hurdle for students’ graduation. Schools need the resources to ensure students have equitable access to the options they purportedly have a right to.

The notion that WBL programs lead to ‘dead-end’ jobs need to be reexamined. One report showed that on average, CTE students earn \$250-300,000 more over their careers than non-CTE students (Advance CTE 2016 Report, as cited in Here to Here, 2019, p. 9). In *The*

Overlooked Value of Certificates and Associate's Degrees, Georgetown University's Center on Education and the Workforce presents data that associate degrees and certificate programs more typically associated with specific occupations can have the potential to lead to well-paying careers:

In some cases, depending on the field of study, workers with certificates and associate's degrees earn more than those with bachelor's degrees. Associate's degree holders who studied engineering have median earnings between \$50,001 and \$60,000 per year, compared to workers with a bachelor's degree in education, who have median earnings between \$30,001 and \$40,000 per year. Workers with certificates in construction trades and other blue-collar fields have median earnings that are as high as those of bachelor's degree recipients in liberal arts and humanities (between \$40,001 and \$50,000)

(Carnevale et al., 2020, p. 24).

Like definitions, language matters. It is worth noting that even lower paying jobs promote cognitive skills that can be applied to higher paying jobs and occupations. Instead of adopting fatalistic language like 'dead-end' jobs, emphasis should be shifted to developing young people's transferrable skills to help them grow in their careers.

Creating seamless partnerships between the New York City Department of Education and employers is too challenging.

As school districts are typically the intermediaries between schools and employers for WBL opportunities, the NYC DOE would facilitate the needed partnerships to ensure there are sufficient slots for high school students. In 2019-2020 alone, there were 71,237 students in 11th grade, and 68,701 students in 12th grade in New York City's public high schools (NYSED).

There is no doubt it would be challenging to execute a network of this magnitude, but New York

City is capable of accomplishing it over several years. One of Mayor de Blasio's signature initiatives has been NYC's Community Schools. New York City defines community schools as "an equity strategy to organize resources and share leadership so that academics, health, youth development, and family engagement are integrated into the fabric of schools" (NYC Community Schools, n.d.). Partnerships with lead community-based organizations (CBOs) and other city agencies spearheaded by the Office of Community Schools have made this possible. When the program began in the fall of 2014, only 45 schools participated (NYC DOE, n.d.). Currently, in the fall of 2021, there are 317 community schools in every school district in the city with more than 70 lead CBOs supporting over 150,000 students (NYC DOE Info Hub, n.d.). In fiscal year 2022, funding will be increased to expand community schools to a total of 406 schools (2021, schools.nyc.gov). These are funded by city, state, and federal dollars. Although a WBL program for juniors and seniors, and the Community Schools initiative are different, an extensive network of partnerships with CBOs makes them similar.

Besides CBOs, there has been mention of asking corporate partners to become involved in this endeavor. Because private corporations cannot be coerced to participate, they must be convinced. As the *Pathways to Prosperity* report elaborated, there are several examples of countries in Northern and Central Europe where employers are heavily involved in providing WBL and apprenticeship programs for high school students (2011, pp. 15-19). It would be ingenuous to believe employers are doing this work for altruistic purposes, nor would education policymakers expect them to. What these programs have in common is the notion that employers have a stake in offering young people these opportunities and that they too stand to benefit from the relationship. The WBL manual delineates the benefits for employers to participate in WBL:

BENEFITS FOR EMPLOYERS

Encourages involvement in the [career] curriculum development process

Establishes a connection between industry professionals and education providers

Develops good relationships between worksite mentors and students

Provides potential skilled and motivated employees

Offers an opportunity to provide community service (2021, p. 3).

Here to Here's policy brief further elaborates on the NYSED's WBL manual reasoning by citing the financial incentive of "curb[ing] costs of hiring entry-level workers" (2019, p. 3).

VI. Approval and Implementation Process

Consistent messaging regarding College and Career Readiness from the New York State Education Department and New York City's Department of Education.

In the digital era, information is accessed online. As the leading authority on public school education in the state, the NYSED should create and publish a comprehensive definition of college and career readiness informed by the learning standards, including CDOS, and proponents of WBL. Each school district in New York will centrally adopt this definition on their websites, including New York City. The NYSED should streamline their website and make the CDOS learning standards as easily accessible as the state's academic learning standards. These changes must be visibly communicated to begin to make an impact on educational priorities.

Building a local public media campaign promoting work-based learning.

Since a new administration will be taking office in January of 2022, the Office of the Mayor will undergo a rebranding campaign that aligns with its politics. It is precisely in this moment that Mayor-elect Adams should begin to use social media and other marketing tools to set his education agenda and show how he plans to be the "cradle to career" and "birth to

profession” mayor for all New Yorkers. As a storytelling enthusiast his rebranding campaign could incorporate the voices of young people whose lives were positively impacted by work-based learning while they were in school.

Changing high school graduation requirements at the state level and/or starting a work-based learning initiative at the city-level.

As influential as the New York City school district is for its size, changing high school graduation requirements could only be executed at the state level. Before amendments to the Regulations of the Commissioner of Education are proposed, regional meetings need to be held across the state to garner feedback from stakeholders including students, parents, educators, administrators, and others. Based on the regional meetings, a Blue Ribbon Commission will give final recommendations to the Board of Regents which will decide how to proceed. As many bureaucratic processes, this takes a long time. The current review of graduation measures was announced in July of 2019. As things stand now with the delays incurred by the COVID-19 pandemic, the Board of Regents is scheduled to discuss the results of the Blue Ribbon Commission in the spring or summer of 2024 (NYSED *Fact Sheet*, n.d.). If any changes are decided, they will probably be phased in over several years. This means that students who were incoming freshmen in high school in the fall of 2019 will have graduated by the time the Board of Regents has come to a decision. Although New York City cannot change graduation requirements on its own, as the largest school district in the country it can set precedents as it has with its universal pre-K initiative. Mayor-elect Adams’s administration will have the opportunity to focus the city’s education budget on key initiatives like WBL that can have a real impact on youth and inspire other school districts to do the same.

VII. Obstacles to Approval and Implementation

The scope is too large!

Perhaps the main objection would be from those who would be securing the resources and implementing the WBL program. There is no doubt the scope of this program is large, but it is not too large that it is not worth trying. There was a time when people did not think universal pre-K was possible in a city as large as New York, but now it is, and it is growing to include more 3-K programs. The size of a universal WBL program for high school juniors and seniors is its advantage in that it allows for a massive mobilization of resources for experimentation, modification, and innovation. The stakes are high for the future workforce.

VIII. Conclusion

Future education policies on WBL should not only focus on high school as I have, but examine further connections in K-12, K-16, or even K-20 education. Research could explore the role of colleges in providing WBL opportunities to help college students see the connection between their fields of study and possible career paths. As I mentioned in an earlier section, the CDOS learning standards cover grades K-12. Ideally, career readiness should not begin in 11th or 12th grade but be scaffolded on exposure in the lower grades. The consideration of this education policy proposal is apt for the incoming mayoral administration and the state's current review of graduation requirements especially in the age of the COVID-19 pandemic when educational inequities were exacerbated and exposed.

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