# Evaluation of the Valley Transportation Authority's DO IT! Program

A "Ladders of Opportunity Initiative"
Program Funded by the Federal
Transit Administration







MTI Report WP 12-18







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# REPORT WP 12-18

# **EVALUATION OF THE VALLEY** TRANSPORTATION AUTHORITY'S DO IT! PROGRAM

# A "LADDERS OF OPPORTUNITY INITIATIVE" PROGRAM **FUNDED BY THE FEDERAL TRANSIT ADMINISTRATION**

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The U.S. Department of Transportation (USDOT) has increasingly demonstrated interest in developing programs that will enhance the workforce capacity of future transportation systems. To that end, USDOT sponsored the 2015 Innovative Public Transportation Workforce Development program, directed by the Federal Transit Administration. This program sought to enhance the availability of skilled workers from targeted groups, including the underserved, underemployed, and/or minority groups into possible transit-oriented career paths. One of the 19 programs selected for funding was the "DO IT!" project proposed and developed by the Valley Transit Authority (VTA). VTA proposed to create an innovative education and training program that focused on attracting and ultimately hiring underserved, underemployed, and/or minority groups in its service area of Santa Clara County. The program was created with two major goals in mind: (1) to enable VTA to work with local youth who may not otherwise have the opportunity to be exposed to a career in public transportation – specifically in the area of transportation planning; and (2) to provide a ladder of opportunity into the middle class which will help strengthen our workforce and our intercity communities by building the critical skillset needed to maintain a competitive and efficient public transportation service. This report provides an evaluation of the "Do It!" Program and presents recommendations for program replication.

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# **EXECUTIVE SUMMARY**

In 2015, the Santa Clara Valley Transportation Authority (VTA) was awarded a competitive grant from the Federal Transit Administration (FTA). VTA proposed to create an innovative education and training program that focused on attracting and ultimately hiring underserved, underemployed, and/or minority groups in its service area of Santa Clara County. The program was created with two major goals in mind: (1) to enable VTA to work with local youth who may not otherwise have the opportunity to be exposed to a career in public transportation – specifically in the area of transportation planning; and (2) to provide a ladder of opportunity into the middle class which will help strengthen our workforce and our intercity communities by building the critical skillset needed to maintain a competitive and efficient public transportation service. The Mineta Transportation Institute (MTI) was enlisted to provide an ongoing program evaluation role that culminated in this report.

**Initial Implementation Challenges and Responses.** VTA and its partners encountered challenges commonly associated with new and innovative programs, including:

- · Staff turnover:
- Lack of clarity about expectations for partners; and
- Lack of adequate communication among program partners.

VTA management made critical adjustments including staff reassignments. The newly reassembled team quickly made progress. The team took critical action to address these challenges in the following ways:

- Increased communication and collaborative involvement of partners;
- Resolved critical decisions about key areas of program uncertainty and communicated these to partners; and
- Discussed and revised partner roles. Most notably, Foothill College's (FC's) role shifted from curriculum development to providing a skilled set of program participants.

**Program Delivery.** Once the program was ready for implementation, its major components were:

- 1. On-site VTA staff and mentor presentations at each partner locale;
- 2. Visits to the VTA by Independence High School (IHS) students;
- 3. Solicitation of internship applications, review of applications, and applicant interviews: and
- 4. Selection of interns.

**Program Participants.** MTI collected survey data from student participants at each partner institution before and after the VTA presentations. The survey responses indicated that participating youth had positive perceptions about the content delivered at program events. The distribution of participants across participating institutions reflected differences in student bodies and in the ways that student outreach took place in each institution.

**Program Engagement and Effectiveness.** Participant survey results documented student engagement and the reported benefits of program activities for student participants across the partner institutions. Survey and interview findings clearly indicate that the great majority of participants found the DO IT! activities to be highly engaging and that they had positive effects on their career aspirations and outlook.

**Internships.** The internships were the most intensive component of DO IT! and provided the most focused career development experience. A total of five interns were hired. Mentors were engaged in a variety of ways of potential benefit both to VTA and to each intern. VTA mentors provided ongoing direction and feedback to individual interns, who worked both on individual assignments and on several group projects organized by the mentors. Both mentors and interns reported a high degree of satisfaction with the contributions involved with the internships.

**Outcomes Summary.** The VTA DO IT! program was a successful and innovative foray into developing a more diverse workforce in a major transit system. Among its notable outcomes:

- VTA developed a flexible collaborative partnership with three significantly different educational institutions.
- VTA overcame some initial road bumps, moving from a challenging preliminary stage to a well-implemented project in a timely manner.
- VTA successfully deployed its own institutional familiarity with internships to create an attractive and effective series of presentations at partner sites and at VTA.
- VTA was able to meet a key goal of the project by identifying and selecting an ethnically and economically diverse group of interns, while learning more about the pool of potential hires presented by each partner.
- VTA mentors and interns delivered a series of important contributions to the mission of VTA, with the promise of eventual careers at VTA in the realm of possibility.
- VTA successfully revised partner roles and program activities to incorporate partner strengths and meet the diverse needs of participants in each institution.

**Lessons for Program Replication or Improvement**. Lessons for sustaining or replicating improvements in an innovative program such as DO IT! are an important purpose of this evaluation. Lessons for future application of the DO IT! program concept that have emerged through this study include:

- Create a clear statement of the proposed innovation.
- Ensure a problem-solving orientation that allows flexibility and adaptation during the program.
- Recognize importance of effective and stable program staffing.
- Focus on strong partner collaboration.
- Promote mutual benefit for all partners.
- Adopt flexible and responsive implementation.
- Ensure responsiveness to diverse participant needs and circumstances.
- Focus on ongoing program assessment and learning from past experiences to improve future programs.

# I. INTRODUCTION

The Discover Opportunities – in Transit (DO IT!) program was developed by the Santa Clara Valley Transportation Authority (VTA) to address two issues of concern. First, the program was designed to enable VTA to work with local youth who may not otherwise have the opportunity to be exposed to a career in public transportation – specifically in the area of transportation planning. The DO IT! program focused on opportunities in the agency's planning department. Second, the program was designed to provide a ladder of opportunity into the middle class which will help strengthen our workforce and our intercity communities by building the critical skillset needed to maintain a competitive and efficient public transportation service.

VTA proposed the program concept to the Federal Transit Administration (FTA) in an application for an Innovative Public Transportation Workforce Development Program grant. This grant program supports initiatives that work to recruit, train, retain, and educate a high-quality transportation workforce to meet industry and community needs. The major objective of the DO IT! program as stated in the VTA grant proposal was "to prepare and direct underserved, underemployed, and/or minority groups into the Transportation Planner career." This goal was consistent with the purpose of the FTA Workforce Development Program and was intended to help solve the two primary problems identified above. It also served a larger VTA objective of contributing to the community by engaging underserved youth and increasing their awareness and motivation to pursue a career, possibly at VTA. VTA's grant application was successful, and DO IT! was launched in 2015.

# II. PROGRAM COMPONENTS

The DO IT! Program was originally designed to comprise several major components, including the following:

- VTA would build a collaboration of strategic partners to implement DO IT! by developing and delivering training that would assist program participants in gaining basic qualifications for entry level in transportation planning. Strategic partners were seen as collaborators in providing access to the targeted participants, providing and participating in developing appropriate training curricula, and delivering that training to participants. Collaborating partners included Independence High School (IHS) and San José Job Corps (SJJC), who were expected to recruit and provide education and training opportunities to participants. Foothill College (FC), part of the Foothill-De Anza Community College District, was originally included to assist with curriculum planning for the training phase. However, as program planning proceeded, FC students also became a source of program participants.
- In addition to the participant recruitment and training component, the DO IT! program was designed to qualify successful program participants to apply for four-month internships at VTA. This component builds on VTA's long and successful history in using intern programs to supply job experience and personal growth for persons seeking careers, and sometimes to fill VTA needs for employees. Many current VTA employees started in these internships. DO IT! made an innovative use of internships to promote a larger career awareness in and planning service to their target population. The DO IT! program committed VTA to five internships for which "candidates who complete the designated Transportation Planner training" could apply. VTA also planned to seek additional intern opportunities in related organizations for which DO IT! participants might compete. Five VTA paid internships were reserved for DO IT! students, creating an incentive to fully participate in the program.
- The evaluation team from the Mineta Transportation Institute (MTI) at San José State University was also a partner. MTI's role was to conduct a process evaluation focusing on identifying lessons for possible future replications of similar programs, and providing some informational and program development assistance. The evaluation collected information on the planning and implementation of DO IT! by a) compiling and reviewing program materials (e.g., curriculum descriptions, recruitment information, and descriptions of internships); b) conducting surveys of participants early in the program and near completion; and c) conducting numerous interviews with program managers, collaborators, participants, internship mentors, and interns.

In summary, the DO IT! program is an effort to utilize a) collaborative outreach to underserved youth, b) training and education concerning transit career opportunities and relevant skills, and c) internship opportunities to increase awareness and motivation to pursue careers in public transit. The use of internships is well established at VTA, but the other components of the program are innovative, and this initial program experience has

produced a rich learning experience. This evaluation report documents program planning and implementation, documents the experience of participants and other program outcomes, and provides lessons for future programming.

# III. PROGRAM IMPLEMENTATION: PLANNING AND COLLABORATION

In its first year, VTA focused on refining DO IT! program design and developing capacity within the agency and among its partners to implement the program. Major challenges and accomplishments in this phase are summarized and explored below.

## IMPLEMENTATION CHALLENGES AND RESOLUTIONS

As decades of evaluation research have indicated, nascent and innovative programs in public agencies frequently encounter challenges as they move from the proposal stage into actual program implementation. Indeed, a classic analysis of program implementation¹ focused on a personnel-training program that was not entirely dissimilar from DO IT! The proposed VTA program similarly implied a number of moving parts that would have to cohere rather quickly in order for the program to launch smoothly. In practice, the ability of the various program partners to jump into the newly initiated program was less than optimal. Therefore, some confusion and delay in the program occurred that VTA was fortunately able to overcome in relatively straightforward ways. None of the challenges were unique to the VTA or the DO IT! program. However, other agencies considering this kind of a program could benefit from understanding how and why disruptions occurred. Specific implementation challenges are discussed below.

# **Clarity about Expectations for Partners**

Initially, VTA's expectations for its partners in the DO IT! project were not clearly communicated. For example, the timeline for when internships would be available, how students would apply for them, what they would require, and other details were not provided in a timely or clear fashion. As a further illustration, an initial planning meeting got sidetracked on the issue of how program participants should be defined. It was unclear whether VTA intended an explicit identification of students who met target criteria, or a less formal approach that provided opportunities for interested students to participate according to their interest. This issue had important implications for the evaluation team concerning how to collect data on program participants. Another example was the grant proposal references to curriculum development. The content or scope of this curriculum development, or how it was to be incorporated into the teaching partners' existing curriculum programs, was unclear. The kinds of curriculum support that would be provided by partners or what kinds of curriculum augmentation would be needed for the program to succeed were open to question.

# **Communication between VTA and the Program Partners**

For a variety of reasons, regular and reliable lines of communication between representatives of IHS, SJJC, and FC became a related problem. This occurred in part because key contacts at partner agencies were either not identified or changed due to personnel shifts (see "Staff Turnover" below.) In any event, regular communication lines were not immediately established, so there was no clear channel for asking questions, making suggestions, or providing guidance. A collaborative project requires regular and interactive communication to operate effectively.

# **Program Outreach Materials**

In the early stages of planning and collaboration, the program was not described in materials that would inform partners and describe the program to participants. Materials such as fliers for recruitment, brief statements of program purpose and opportunities, descriptions of internship skill needs, and clear timelines were not quickly created and circulated.

# **Role of Partners**

The program proposal provided scant direction concerning the expected roles and responsibilities of individuals at each partner location. Early planning meetings were either not attended or included participants who weren't really in a position to make meaningful suggestions. Although it was clear that significant effort from each partner would need to occur, it was less clear what these efforts would entail and what – if any – incentives were available to help ensure these efforts.

Significantly, the role for FC was not initially clear. Although the program proposal called for a curriculum development role for the college, subsequent communication with FC staff suggested that such a role was both unnecessary and beyond the scope of this project. The initially proposed DO IT! program anticipated that FC would "partner with VTA to identify minimum entry level skills and assist in the development of introductory courses for SJJC and IHS students, supporting the skills and competencies that will prepare them for future careers in the transportation planning field." In the initial months of the design and capacity-building phase of the project development, partners made it clear that developing new curriculum for course work in SJJC and IHS was not necessary or feasible. There were several reasons, including:

- There was no clear VTA guidance on curriculum expectations for DO IT! program participants, nor on the precise skills that would make them competitive for the internships;
- IHS and SJJC had existing courses with some relevance to transportation planning and complete revisions to accommodate the DO IT! program were not feasible; and
- FC was named as a partner in curriculum development in the proposal, but the curriculum-development process that FC was qualified to implement was far too complex and resource-consuming than feasible or necessary for DO IT!

In response, and to clarify this issue, VTA contracted with a consulting firm to provide assistance to identify curriculum needs, specify skills that would meet VTA and internship needs, and determine how to fulfill these needs. The consultant report was useful in clarifying:

- Specific existing education opportunities (e.g., course topics, additional educational opportunities) relevant to DO IT! needs;
- · Differences in preparation and job readiness in IHS and SJJC students; and

 Additional resources, training, and orientation available through VTA and other sources that could enrich the existing curricula in the partner agencies without requiring major change in existing courses.<sup>2</sup> (IHS had already made minor adjustments in course content to strengthen relevance to DO IT! student needs.)

Other parts of the consultant report prompted discussion that clarified appropriate expectations for participant training, education, and qualifications. For example, the consultant report recommended developing and assessing specific technical or cognitive skills (e.g., sense of direction, geo-spatial intelligence). Discussion of this recommendation resulted in recognizing that these abilities and skills were not appropriate for the purposes of DO IT! and could contradict the program desire to provide opportunities to local and underserved students.

### **Staff Turnover**

A significant issue that crosscuts each of the preceding challenges was turnover among key staff, both at VTA and partner agencies. Without consistency among key actors, implementation of a new and innovative program becomes even more difficult. First, one of the key managers who had helped craft the DO IT! proposal went on extended leave, and eventually retired from the agency, just at the onset of the grant. Second, key contacts at both the SJJC and IHS also rotated from their positions, leaving new and unfamiliar faces in their stead. Although replacements were appointed quickly, the personnel changes exacerbated challenges as new staff had to start from scratch and gain familiarity with the program's design and intent.

The cumulative impact of these challenges meant that resolution of crucial issues, such as participant recruitment, partner roles and their interrelation, realistic curriculum expectations, and internship description and selection spilled over into the program implementation period. At this point, potential participants were already entering classes. Indeed, the relatively short SJJC courses meant that some potential participants had already completed courses in which there could have been outreach. Responding to these challenges and obstacles required making decisions about program procedures without full consideration of how they fit with initial program intentions. This issue will be discussed further in the concluding sections.

### **RESOLUTION OF KEY CHALLENGES**

Keenly aware that the efficacy of the program was threatened, VTA management quickly sought to resolve the aforementioned issues. VTA made some critical staff reassignments, and a newly reassembled team quickly made progress. The new team took the following steps:

### 1. Communication and Outreach

Communication and outreach to partners was redoubled. In a relatively short time, a reliable and committed set of critical actors from each partner institution was identified and more effective communications instituted.

# 2. Critical Decisions Finalized

Critical decisions about curriculum expectations, internship description and application, VTA staff contributions to participant training, and other program issues were resolved and communicated to partners. With clarity in role expectations and support materials, instructors at each partner institution were able to more effectively implement the program. Of particular importance to the overall direction of the program, participating individual was ultimately defined as any student who participates in designated courses or participates in presentations. All of these participants would be given the opportunity to apply for internships as well as complete pre- and post-participation evaluation surveys.

The role of FC was changed significantly; its role in curriculum development was dropped due to impracticality. However, VTA opted to open up internships to FC students in a program that is directly relevant to employment in transportation planning.

# 3. Program Publicity Materials Developed and Disseminated

VTA staff developed fliers and related internet content to help partners publicize the program. Subsequent surveys document that many prospective participants were exposed to these materials.

# 4. Curriculum Delivery Mode Developed

Importantly, the team determined that the most direct and feasible way to deliver program content was via VTA staff presentations to program participants. VTA recognized that it was unrealistic and not justifiable to expect that partners could institute entirely new curricula in the short period that would be required for the program to succeed in a timely manner.

The VTA team realized that they had a substantial resource in VTA's experience with hiring and mentoring interns. The new approach sought to mobilize this experience in the form of a team of mentors who would both a) deliver a series of presentations to students at partner institutions, and b) screen, select and direct the interns ultimately selected for the DO IT! program. Four program mentors were selected, each with a different focus within VTA's planning department. The mentors included two Senior Planners, one with policy-level responsibilities, another a Geographic Information System (GIS) expert, as well as an Environmental Planner and a Traffic Engineer. Several of the mentors had themselves entered VTA via an internship experience and were well positioned to advise and serve as role models for the DO IT! interns.

# 5. Curriculum Requirements Finalized

Curriculum requirements for intern applicants would be fulfilled by students being in or having completed designated courses at each partner institution. Partner institutions could add or modify courses to assist students in pursuing the internships and transportation-planning careers, but VTA would not require additional curricula. Thus, the originally conceived role for FC to devise a new curriculum was not necessary, and FC's role was converted to becoming another potential source of participants and prospective interns.

# **SUMMARY**

Consistent with the experience of many public agencies that seek to create new and innovative programs, VTA experienced challenges as the proposed program was implemented. Internally, VTA had to stabilize staff and improve communications. VTA also had to improve collaborative decision-making with partner organizations. VTA challenges also included rethinking some of the proposed components of DO IT! in light of what was feasible and necessary for successful program implementation. Rethinking curriculum expectations and relying more on direct involvement of VTA staff in the education process were important examples. Concomitant clarifications of curriculum expectations and modifications in each of the partner institutions were accomplished. IHS was most active in adding segments and topics to existing courses that increased relevance to the DO IT! program. Engagement of participants in all partner institutions focused on courses that addressed topics most relevant to transportation planning and a career in transportation.

Overall, the initial planning and collaboration period ended with significant accomplishments, and the program developed more feasible and realistic activities and procedures. Each of the three partner institutions would receive presentations from the VTA mentor team, and each would therefore also be a source of potential internship applications and hires. The VTA team was able to schedule visits to each institution in a timely fashion (in early 2017), as well as publicize the internships with flyers and on-line supporting materials.

These actions succeeded in engaging partners, helped to define the scope and focus of the program's efforts, and created a doable role for each of the partner institutions. As described below, these partner roles were shaped by partner constraints and opportunities that emerged as implementation was being initiated. The result was shaped by what made sense in the implementation environment as much, and sometimes more, than by some of the details of the proposed program intent and planned structure and procedures. Examples from each partner are discussed below.

# Focus on STEAM Academy at IHS

While no IHS students were excluded from applying for the DO IT! internships, program outreach was clearly focused on students enrolled in the IHS "STEAM Academy" (Science, Technology, Engineering, Arts, and Mathematics) program. The STEAM Academy includes approximately 290 youth from 9<sup>th</sup> to 12<sup>th</sup> grades. These students enroll in a series of classes taught by instructors with an engineering and technology focus. STEAM students are most likely to have an interest in and at least some appropriate skills that match the DO IT! internships and career opportunities. Thus, they are likely to be more prepared with respect to technical skills required in the internships than other IHS students. However, student self-selection into STEAM may reduce opportunities for VTA to reach students with limited opportunities – an important goal of the DO IT! program.

# Focus on Job Corps Advanced Training Program at SJJC

Similarly, the focus at SJJC was on approximately 40 students enrolled in the Job Corps Advanced Training Program, which is sponsored by the area Transportation Communications International Union. Although promotional materials were made available to all SJJC students, the VTA presentation was focused on those enrolled in this transportation-specific component. This focus of the selection pool is also likely to yield program participants who were more prepared for VTA internships and career opportunities than other SJJC students.

# Focus on GIS Course/Certificate Program at FC

At FC, the program was publicized to all students with an interest in an internship, but the VTA effort focused on those enrolled in a particular instructor's GIS class. These approximately 20 students were also enrolled in a GIS certificate program. Again, the focus on students with career and technical interests relevant to VTA opportunities could narrow the participant pool in ways that may limit outreach to students who have not yet had the opportunity to consider transportation careers in their earlier educational experience.

In summary, the partner organizations ended up more as providers of pools of program participants that were already acquiring skills suitable to the VTA internships and career track in transportation planning. They provided a forum for presentations and brief training sessions by VTA staff, largely those who would mentor successful intern applicants. They did not deliver curricula designed to train participants in skills specifically oriented to the internships or the transportation career track. The lessons from this process, and implications for similar programs, will be discussed in the concluding sections.

# IV. PROGRAM IMPLEMENTATION: PROGRAM ACTIVITIES AND PROCEDURES

With the program direction and the role of partners clarified and participant outreach initiated, DO IT! transitioned into a more operational phase. The following program components were completed during this phase:

- On-site VTA mentor presentations at each partner locale;
- Visits to the VTA by IHS students;
- Solicitation of internship applications, review of applications, and applicant interviews; and
- · Selection of interns.

#### ON-SITE VTA MENTOR PRESENTATIONS

# **Independence High School**

Three DO IT! events were held for IHS Students. The first was held during the school day at the IHS campus on January 27, 2017. Students from the 10<sup>th</sup>, 11<sup>th</sup>, and 12<sup>th</sup> grades enrolled in relevant "STEAM Academy" courses were asked to attend, and approximately 200 turned out. Two VTA mentors made presentations: one on high-tech needs and opportunities in transportation planning, the other (more personal) focusing on an employee's VTA career opportunities and successes from humble beginnings as an immigrant. Students were clearly engaged. A group activity ended the session. Reports from IHS and VTA staff indicated that participants showed strong interest in the program.

The second event was for upperclassmen only and took place at VTA on February 15, 2017; approximately 50 students attended. This event was organized in three stations to allow smaller groups to rotate between them and have a more interactive experience.

The first station provided an overview of the internship opportunity, including details about application (due by March 12), and that participants would be paid at \$15 an hour. This detail had not been disseminated earlier in the design and capacity phase, and clearly sparked greater interest in the program for some participants. A staff member who told her compelling story of career opportunity at VTA also presented. She added discussion of VTA activities and services to the community that go beyond the technical issues of transit planning.

The second station was on VTA's brand-new trip-planning software available for the public to plan transit trips online. Students were able to use it through computer stations during the presentation. This hands-on experience was clearly engaging to many participants.

The third station provided more detail on the range of services and employment opportunities at VTA, including congestion management and highway construction/maintenance. This informational component was a useful complement to the more engaging and focused stations.

A third event occurred back at the HIS campus on March 7, 2017, and focused on Environmental Planning.

These events were well executed and well received by participants and partner staff. Direct exposure to VTA employees and the facility clearly made the internship and possible career opportunities more palpable and appealing to at least some students. The events reached a significant number of students. Nearly 300 evaluation baseline surveys from the combined three partners were completed and submitted in conjunction with events.

# San José Job Corps

The VTA mentor team presented at an SJJC site in downtown San José on February 8 and March 1, 2017. Attending students were largely associated with the transportation program offered by SJJC; a different group of students attended each session. The students were generally older than the IHS participants and extremely attentive and responsive. The VTA mentors explained that the internships would directly serve to achieve VTA goals that had been identified for the agency. Several mentors spoke. SJJC participants later indicated that the mentor relating her experience as a child of immigrants was most compelling. She learned English in high school, got an internship with VTA, and found a great career. This may have been particularly important to the SJJC audience, which was even more diverse in ethnicity and gender than either IHS or FC. The second part of the outreach session involved student participation in a group activity, with which students seemed to be actively engaged.

# Foothill College

A DO IT! outreach event was held at FC on February 23, 2017. Attendance was only about half of the anticipated 25 students, possibly due to a massive rainstorm. The attendees in this program were very different from those at IHS and SJJC. Many already had college experience, including some with Bachelor's Degrees. They were drawn from a GIS course program that leads to a GIS certificate and possibly an Associate's degree. GIS, a software system that supports interactive mapping applications, is very important to VTA needs.

An FC course instructor who attended the presentation indicated that the internship met the interests of many of these students who were well educated but wanted better job options. They needed experience that the internship would provide. The presentation reflected this, focusing on GIS applications in many VTA functions including toll payment systems, dynamic pricing, and the new trip-planning system. The value of further technical training (e.g., CAD) for VTA employment was emphasized. Attendees asked sophisticated questions related to technical applications and to intern and career opportunities at VTA. The presentation also offered information about the potential internship experience and how to apply. Eleven evaluation baseline surveys were completed and returned.

# **INTERN SELECTION PROCESS**

Via publicity at the partner institutions, the VTA website, and information provided through DO IT! events and partner instructors, VTA solicited applications for the DO IT! internships until March 12, 2017. Per the terms of the grant, one student intern had been selected in November, 2016, leaving four additional selections to be made. VTA received a total of 25 applications, including 23 that were deemed to be valid enough to warrant more thorough evaluation. Approximately half of these applications were selected for on-site interviews at VTA.

As confirmed by survey data discussed in a following section, the program was less effective at eliciting participation from females at IHS. Of the eight applications received from IHS, only two were female. However, this was likely due to the fact that the vast majority of STEAM Academy students at IHS were males. The other partner institutions contributed applicant pools that were each more than half female.

One decision rule was to select at least one intern from each project partner, which helped reward partner participation in the project. Beyond that, VTA weighed the stated goals of the project concerning opportunity and support for underserved student career development against the actual labor-force needs at VTA. After some discussion, the VTA team opted to select interns with a view toward how much the individual intern could be expected to benefit and to place less emphasis on how much skill or knowledge each intern could be expected to bring to VTA. The idea was to emphasize interns' exposure to the work and policy environment rather than to provide them with a direct career track.

Interviews with members of the applicant pools suggested substantial differences in reasons for participation and expectation of benefits. For example, the FC students were focused on rather specific career goals, while IHS and SJJC participants tended to have less clearly defined career focus. The screening process was rigorous, and included a round of on-site interviews. The team assessed each candidate in part by using a matrix of desirable skills and interests and general fit with VTA and fulfillment of the DO IT! grant goals. The VTA team ultimately selected two interns from IHS (including the one that was selected in November, 2016), one from SJJC, and two from FC. Proportionally, more interns were selected from the applicant pools with more skills preparation, and with participants closer to initiating a career.

### INTERN SELECTION RESULTS

As originally conceived, the internship component was designed to support two key program goals related to helping VTA find local, qualified candidates for future positions at the agency and to encourage local youth to follow career paths in transportation. However, VTA recognized that a key value of the program was to provide a high-quality experience, particularly for youth, as opposed to a focus exclusively on a career pathway. The final internship program enabled a much broader range of opportunities for participants, from learning about professional responsibilities to a potential position at VTA.

The two IHS students demonstrated substantial long-term potential due to their participation in the STEAM Academy and skills to be gained through involvement with that program, while also adding economic and racial/ethnic diversity to the corps. However, due to their youth and inexperience, their VTA internships were more likely to provide a valuable formative experience rather than a more specific potential career opportunity. Both IHS students headed to college in the fall of 2017.

The selection from SJJC, due to her involvement in the Transportation Communications International Union program, was a recent high school graduate who had thought of transportation in terms of a customer service context (ticketing, etc.). Her exposure to the DO IT! program seems to have broadened her perspective. She has continued working as a consultant at VTA while enrolling in a local community college.

The two FC students are both completing the GIS certificate program at FC. One is a college graduate who sees the internship as a means of getting practical experience and perhaps a foothold on an entry-level professional career position. She is currently enrolled in a graduate program in transportation management. The other is a more traditional junior college student, who has worked in various service industry jobs and has moved into a professional career with an employer in the GIS field. Both are female, and according to program mentors they have thrived in the VTA environment. Both seem likely to be interested in remaining at VTA if the opportunity arises.

In sum, the selections VTA made reflect a complementary variety of agency and DO IT! grant objectives. These selections may add diversity in terms of economic background, race, and/ or gender to the transportation and VTA workforce. The internships may provide the two IHS selectees with a valuable developmental experience that may or may not culminate in a transportation-related career. For the selectees from more advanced educational backgrounds, the internship will provide focused work experience and may produce skilled VTA employees if the opportunity is there. VTA worked with a competitive and diverse group of applicants to select students who represented most program objectives.

# **SUMMARY**

Before the DO IT! program was fully implemented, collaboration and communications between VTA and partners had greatly improved, and the role expectations of partners had been clarified. The program that emerged from these changes was less complex, and implementation was straightforward. Partner institutions were no longer expected to develop and implement curricula that would provide focused training related to transit career skills and options. Neither were program participants expected to enroll in the DO IT! program in a formal way. The program that emerged and was actually implemented had four major components.

1. Voluntary Participation Focused on Class Enrollment. Participants in the program were primarily defined by being enrolled in courses that provided skills and indicated educational interests relevant to a transportation career, and more specifically the VTA career path. Beyond those enrolled in courses, at least some students saw DO IT! materials on posters and other promotional media.

- 2. Partner Staff Support. Individual instructors, and sometimes other staff, supported the program through teaching relevant courses, sometimes (at IHS) adding information to a course that addressed material and skills more directly relevant to internship opportunity. They also made announcements and provided information about DO IT!, answered student queries about the program, and in some instances provided support for the VTA staff presentations on campus or at VTA.
- 3. VTA-led Curriculum. VTA staff members were primarily responsible for providing information on the program to participants. This was done through providing brief materials describing the program, making presentations describing the VTA career environment and specific skills, and informing participants about the internship program, including an doing on-site workshop at VTA. Staff also selected interns and mentored them.
- 4. Goals-Driven Intern Selection Process. The internship selection process proceeded in a manner consistent with the goals and objectives of the DO IT! program. Both the interns and VTA are benefitting from the way the program has been put into practice.

Once the startup phase was completed, this program model was successfully implemented and well received by partner institutions and participants. The VTA staff presentations clearly engaged the students, and the internships were a strong draw.

# V. PARTICIPANT BACKGROUND, CHARACTERISTICS, AND READINESS

As described above, outreach activities in the three partner institutions included fliers, posters, a related internet site, and descriptive materials. Outreach was focused in select classes or educational programs most relevant to VTA career interests and skills. To recap, for IHS students, this meant enrollment in that school's STEAM program; for SJJC students, it was participation in the Transportation Communications Union-sponsored program; and for FC students it was enrollment in that college's GIS certificate program. The MTI evaluation team worked with each institution to gather survey information on demographics, preparedness and motivations to participate in DO IT! activities/internships, degree of participation, and perceived effects of DO IT! on career expectations and effort. Surveys were distributed to respondents at early events and near the program completion for each partner. The information reported for participants is defined by who completed at least one of the questionnaires. Information asked for in both questionnaires (e.g. demographics) is counted only once for respondents who completed both. Details on respondent numbers for each survey and each institution are found in the Appendix.

### PARTICIPANT DEMOGRAPHIC PROFILES

Table 1 displays demographic information for participants in each of the partner organizations. The 173 IHS respondents accounted for three-fourths (73%) of all DO IT! participation. FC participants accounted for approximately five percent, and SJJC about twenty percent. The high-school-age students were most appropriate to the VTA intention to provide information, awareness, and motivation to young persons who might otherwise have limited opportunity for support in career development, as well as to create interest in VTA employment for those with roots in the community. The SJJC and FC students were closer to embarking on a chosen career and were more aligned with the maturity and skills needs of traditional VTA internships and career paths. Table 1 supports several observations relevant to the diversity of DO IT! participants.

Table 1. DO IT! Participant Demographics by Partner Organization

	Independence High School	San José Job Corps	Foothill College
Age (Mean years)	16.2	21.9	34.2
Gender			
Male	85.2%	56.8%	81.8%
Female	14.8%	43.2%	18.2%
Race			
Asian	73.8%	12.9%	18.2%
Black	4.8%	6.5%	
Pacific Islander	5.6%	22.6%	
Native American	2.4%	6.5%	
White	6.3%	38.7%	54.5%
Multiple	6.3%	12.9%	18.2%

	Independence High School	San José Job Corps	Foothill College
Ethnicity			
Hispanic	37.4%	43.5%	25.0%
Non-Hispanic	62.6%	56.5%	75.0%
Lunch Program			
Participant	48.6%	N/A	N/A
Non-Participants	51.4%	N/A	N/A
Overall N	157	45	11

Note: All percentages refer to valid responses for each item.

Participants varied substantially in age depending on partner organization. FC participants had an average age (34) of more than twice that of the IHS students (16). Although gender outreach was not an explicit goal of the program, initial DO IT! outreach was ineffective at reaching out to female participants, primarily at IHS. Fewer than 20 percent of participants at IHS and FC were female. Fewer than half (43%) of SJJC participants were female. This may be partly a consequence of actively recruiting from classes or programs within partner institutions, particularly at IHS and FC, that attracted more male participants – although FC ultimately did contribute two female interns to the program.

Racial and ethnic diversity varied substantially by partner. Almost three-fourths (74%) of IHS participants identified as Asian; FC participants were majority white (55%) and non-Hispanic (75%); and SJJC again provided the greatest diversity, with a balanced mix of Asian and other races as well as 43.5% Hispanic ethnicity. Nearly half of the IHS participants were economically challenged, as evidenced by their participation in the school's reduced lunch program (economic background data from other participants was unavailable).

The overall racial/ethnic distribution of respondents somewhat reflects the Santa Clara County population, which is over one-third Asian (37%), just under one-third White non-Hispanic (32%), and one-fourth Hispanic (26%). Just three percent of county residents identify as Black. However, each of the partner organizations clearly provide very different participant pools. Implications of this demographic profile and DO IT! implementation and purpose will be discussed in conclusions concerning program implementation.

# PARTICIPANT EDUCATIONAL PREPARATION AND PLANS

Tables 2 and 3 provide information on educational preparation of participants in each partner institution. Each partner provided a distinct environment with respect to the participants' educational path. The IHS focus on STEAM Institute students for DO IT! outreach created a technical, science-oriented student pool. The great majority had taken or planned to take Introduction to Design (88%) or Engineering Design and Development (78%). These are courses in which some modules of particular relevance to the potential internships had been added. Fewer of the participants had taken or planned to take Computer Information Technology (41%) or AP Statistics (36%).

Table 2. Course Preparation for Possible Internship, Independence High School Respondents

Course	Percent of IHS Respondents <sup>a</sup>
Introduction to Design	88.2%
Computer Information Technology	41.2%
Engineering Design and Development	78.4%
AP Statistics	36.1%

<sup>&</sup>lt;sup>a</sup> Percent of IHS respondents who have, are taking, or plan to take each course.

Table 3. Course Preparation for Possible Internship, San José Job Corps and Foothill College<sup>a</sup>

Course	San José Job Corps	Foothill College
Creative Arts/Design courses	57.8%	63.6%
Engineering courses	31.6%	36.4%
IT/Computer courses	73.7%	100.0%
Math/Science courses	79.0%	80.0%

<sup>&</sup>lt;sup>a</sup> Percent of SJJC and FC respondents who have, are taking, or plan to take each course.

SJJC and FC participants were asked about more general categories of courses. Their responses indicated similar profiles, with approximately 80% of participants in each partner organization indicating they had taken math courses. All FC and somewhat fewer (74%) SJJC participants had taken IT/Computer courses. Fewer participants in either had taken design courses, and only about one-third in either had taken engineering courses. Some FC participants had an additional skill set in GIS, a desirable skill for some possible intern positions. In sum, many IHS participants were initiating an educational path very relevant to the technical skills important to the internships, and FC students had relatively advanced skills in a particular area relevant to the VTA internships. The SJJC participants had more diverse educational backgrounds with less focus in technical areas.

Table 4 summarizes participant plans after completing their current schooling. The choices are not mutually exclusive. For instance, two-thirds or more from each partner institution will be looking for a job, even though they may be pursuing other educational opportunities also. Nearly all (91 %) of FC participants said they would be looking for a job, compared to about two-thirds of IHS participants. Twelve percent of IHS students planned to enter the military. A much greater portion of IHS students had a college degree as a goal, with 84% planning to attend a four-year college. Overall, IHS participants had comparatively high educational aspirations, and the older participants, particularly FC participants, were more immediately focused on employment.

Table 4. Participants' Plans After Current Education<sup>a</sup>

Plans for future	Independence High School	San José Job Corps	Foothill College
Attend a two-year college	42.9%	34.2%	N/A
Attend a four-year college	83.7%	36.8%	36.4%
Attend a career-training program	31.3%	21.1%	44.5%
Enter the military	12.2%	2.6%	0.0%
Look for a job	65.3%	71.1%	90.9%
Take some time to decide what to do	35.4%	N/A	N/Q

<sup>&</sup>lt;sup>a</sup> Percentage of respondents who "definitely" or "pretty much" plan to do after current education.

# PARTICIPANT PERCEPTIONS OF SKILLS

Participant surveys also included questions about self-assessments of their own job skills. Responses are displayed in Table 5. The first four items focus on personal behavioral patterns important to the work place, such as being reliable and working with others. Participants from all three partners had high assessments of themselves in these areas – all were 80% positive or more. IHS participants were just slightly lower, which would be expected for their age. Indeed, their high self-assessment scores on items like "office etiquette" and "working with others" suggest high self-confidence. The next three items concern assessment of individual skills related to work creativity and cognition. In this area, the IHS participants had less positive self-assessments, probably reflecting their youth and lack of experience in using and testing these skills. The next group of items concerns communication skills. Responses display a similar pattern, with the high-schoolage respondents indicating lower levels of positive assessment.

Table 5. Respondent Self-Assessment of Job-Related Skills<sup>a</sup>

Skill	Independence High School	San José Job Corps	Foothill College
Being reliable / having good attendance	83.0%	89.5%	100.0%
Being on time	79.6%	84.2%	81.8%
Office etiquette / knowing how to act	80.3%	81.6%	81.8%
Working with others	79.6%	92.1%	81.8%
Being a self-starter / taking initiative	51.0%	79.0%	72.7%
Logical thinking and problem solving	73.5%	89.5%	100.0%
Creative thinking	61.9%	86.9%	72.7%
Verbal communication	60.5%	76.3%	81.8%
Written communication	57.2%	76.3%	72.7%
Business communication	40.1%	68.4%	54.5%
Working with data and numbers	61.9%	73.7%	N/A
Working with tools and equipment	63.3%	73.7%	63.5%
Using computers / data and numbers	61.2%	65.8%	90.9%
Using computers / word processing	65.3%	71.0%	90.9%
Using computers / graphics and design	48.3%	55.3%	54.5%

<sup>&</sup>lt;sup>a</sup> Percentage of respondents who rated their job skills as "excellent" or "good."

The final five items relate to more technical and applied skills. The pattern here is not as similar across items as patterns in the other areas. For example, about half of the participants from all three partners rated their skill in using computers for graphics and design as good or excellent. With respect to using computers for data and numbers, many more FC participants (91%) than others rated their skills as good or excellent. These applied skills depend on specific interests and experience and vary across partner participants.

# **CAREER ASPIRATIONS AMONG PARTICIPANTS**

The MTI evaluation gathered survey information concerning aspirations, concerns, and confidence about participants' opportunities for career development when they entered the DO IT! program. Table 6 displays the percentage of respondents who were affirmative about each item. There were few large contrasts between partner participants on single items, but there are clear patterns overall. First, large majorities of all those who responded felt they knew what kind of work they were interested in, but (with the exception of SJJC respondents) fewer knew exactly what job they wanted. Most were interested in learning more about options. A large majority (between 70 and 80%) agreed they were excited about looking for a career, but wanted to take the time to be sure and felt they needed more information to make a decision. About half felt somewhat anxious about making a career decision; very few felt unconcerned because there was plenty of time. A substantial number – between 36% and 46% – agreed that they wanted a job near the community where they were born. A majority of FC, and even more so, SJJC, respondents felt that work in public transit "sounded like a possibility." However, just 16% of IHS respondents felt this way.

The pattern of responses did identify general differences between partner respondents that reflect age and degree of career preparation. The IHS response pattern suggests a group of confidant youth who had a general idea of the kind of work they wanted to do. However, most had not yet engaged in that process, did not have specific information on career opportunities, and knew they needed more information. Very few saw work in public transit as a possibility, though this may reflect a lack of knowledge about the range of jobs that public transit encompasses.

Table 6. Perceptions of Career Aspirations when Entering DO IT!<sup>a</sup>

When I think about my future career, I	Independence High School	San José Job Corps	Foothill College
know exactly the job I want.	39.6%	68.4%	36.4%
know the kind of work that interests me.	83.7%	89.5%	63.6%
am very interested in learning about different careers.	71.4%	92.1%	91.0%
work in public transit sounds like a possibility.	15.7%	65.8%	54.5%
need more information.	70.1%	68.4%	63.6%
am anxious to decide on a career.	49.7%	55.3%	54.5%
feel excited.	70.1%	79.0%	72.7%
feel worried.	47.7%	42.1%	72.7%
want to take my time and be sure of what I want.	76.2%	65.8%	81.8%

When I think about my future career, I	Independence High School	San José Job Corps	Foothill College
am confident that I will have a good career.	63.3%	79.0%	40.5%
don't care, there is plenty of time.	6.8%	10.5%	0.0%
want a job near the community I grew up in.	46.3%	42.1%	36.4%

<sup>&</sup>lt;sup>a</sup> Percentage of respondents stating "definitely yes" or "pretty much."

The FC participants provided a contrast. Though older, with more technical skills, this group of participants were least confident about finding a good career, most likely to feel worried, and less sure about the type of work or exact job they wanted. This pattern may reflect this group's more tangible experience with the job market. More than half felt work in public transit was a possibility. In group interviews, respondents noted that they were taking courses, such as GIS, to add specific, employable skills to their education background. In sum, FC respondents were farther along in seeking careers, and wanted to get started. The SJJC participants stand out as most positive and excited about their career futures. Two-thirds felt that work in public transit was a possibility for them.

## **SUMMARY**

This profile describes a diverse participant pool with demographic profiles that differ substantially by partner organization. Participants with an Asian identification are somewhat overrepresented, presumably at least in part because of the makeup of the IHS student body. The data made it clear that each partner organization provided access to very different groups of participants with different age ranges and at different points in developing career expectations, preparation, and skills. DO IT! participants, regardless of partner organization, appeared to have aspirations for meaningful careers. IHS students saw this primarily as requiring higher education, and were establishing high-school course records that demonstrated that belief. The SJJC and FC participants had post-secondary training or education already and seemed more motivated to find immediate employment. All three participant groups believed themselves to be responsible and interpersonally skilled in the work force. This participant profile indicates that DO IT! outreach and recruitment yielded a pool of participants with varying degrees of certainty about specific career options. There was an opportunity to give participants useful experience and resources for progressing, gaining skills, and setting more precise direction in their career paths.

The most obvious demographic inequity in the participants was gender. Fewer than one-fourth of program participants were female. This inequity should be addressed and improved in planning and implementing similar programs, perhaps by taking an earlier accounting of what partner institutions tend to offer in that respect.

# VI. PROGRAM OUTREACH AND OUTCOMES

As described in Section 4, the DO IT! program reached participants through a variety of opportunities, including enrollment in courses or educational programs that conveyed information concerning DO IT!, on-site presentations by VTA staff, a presentation at VTA, suggestions for additional information concerning transit careers, and the possibility of an internship. Table 7 displays information on the percentage of participants in each partner organization who were reached by each of these opportunities.

IHS participants were clearly most exposed across these outreach efforts. The high school environment is more structured than either the job corps or community college environments, allowing better access to students. Participation in the STEAM program may have enhanced this access, and given more motivation for IHS participants to engage in opportunities such as video and other materials that participants could access at their own discretion. FC participants were least exposed to the various outreach methods. The exposure of IHS participants to the program was widespread. Although the educationally more advanced SJJC and FC participants were more interested in career opportunities at VTA as shown in Table 8, they were less exposed to the informational outreach efforts provided by DO IT!

Table 7. Respondent Exposure to DO IT! Outreach Efforts<sup>a</sup>

Measure of Engagement	Independence High School	San José Job Corps	Foothill College
Attend the DO IT! presentation (speakers/group exercise).	80.0%	65.8%	66.7%
Attend the DO IT! trip to a VTA in San José (presentation).	39.3%	N/A	N/A
See and read DO IT! posters, fliers, or other materials.	82.1%	52.6%	33.3%
Hear about DO IT! from teachers in any classroom.	67.5%	55.3%	33.3%
View any videos or other materials (e.g., on the Internet) that were recommended by the DO IT! program.	72.0%	36.8%	0.0%

<sup>&</sup>lt;sup>a</sup> Percentage of respondents who attended or saw each of the listed engagement measures.

Table 8 displays how participation in DO IT! program presentations by VTA staff influenced participants' reported interest and activity concerning a possible transit career. The pattern of results again reflects understandable differences between the younger IHS participants and the older SJJC and FC participants. IHS participants were much more likely than SJJC or FC students to indicate that they were motivated to seek out additional information about transit jobs, showing a DO IT! impact on career search activity in these young participants.

Table 8. Impact of VTA Presentations on Respondents who Reported Attending<sup>a</sup>

Impact on Participant/Respondents	Independence High School	San José Job Corps	Foothill College
seek out any additional information about transit jobs on your own.	95.5%	53.3%	66.7%
learn a lot about public transit as a career possibility.	75.3%	80.6%	100.0%
want to learn more about public transit as a career possibility.	75.3%	64.5%	83.3%
fill out and submit an application for a DO IT! Internship at VTA.	14.7%	46.7%	16.7%
become more interested in a transit career than I was before DO IT!	33.9%	54.8%	66.7%

<sup>&</sup>lt;sup>a</sup> Percentage of respondents who stated "definitely" or "pretty much."

#### Overall:

- A strong majority (75% and above) of respondents across all three groups tended to agree that they had "learned a lot" about the possibilities of a transit career and that they wanted to learn more.
- The FC and SJJC participants (66.7% and 54.8%, respectively) were much more likely to indicate they had become more interested in a transit career than the IHS students (33.9%). This is consistent with their age, involvement in educational programs very relevant to a transit career, and their life-stage focus on establishing a career path.
- SJJC participants were much more motivated to apply for an internship than either of the other groups of participants.

# PROGRAM EFFECTS ON PARTICIPANT CAREER PLANS AND PREPARATION

One of the effects that DO IT! was intended to have on all participants was to provide motivation and growth in career planning. Table 9 displays responses to end-of-program surveys that asked questions about program influences on career planning. SJJC and FC participants reported the greatest effects, with well over two-thirds of the respondents from these groups agreeing that participation in DO IT! had increased their motivation and confidence in nearly every area in which questions were asked. These areas were knowing the kind of work in which they were interested, and deciding that work in public transit was a real possibility for them. In addition, fewer than two-thirds of the FC students saw the program as raising their career expectations. Even for these few items, half or more of the FC and SJJC participants perceived that the program had helped them.

Table 9. Perceptions of How Participating in DO IT! Helped Participant Career Preparation<sup>a</sup>

Participating in DO IT! helped me to	Independence High School	San José Job Corps	Foothill College
know the kind of work that interests me.	37.4%	65.7%	50.0%
learn about the possibility of a career in public transit.	60.1%	80.0%	83.3%
get motivated to plan for a career.	62.6%	74.3%	66.7%
get motivated to go to college.	66.2%	71.4%	66.7%
work harder in school.	59.4%	85.7%	83.3%
look for a job that can help my community.	51.0%	71.4%	66.7%
work to develop skills that will help me get a job.	67.1%	80.0%	83.3%
consider a lot of jobs before deciding what I want to do.	57.9%	74.3%	83.3%
decide that work in public transit is a real possibility for me.	30.0%	60.0%	50.0%
take classes that will help me do work I will like.	66.2%	77.1%	83.3%
work to develop job skills.	67.4%	76.5%	83.3%
gain confidence that I will have a good career.	65.7%	80.0%	66.7%
raise my career expectations.	65.7%	80.0%	50.0%

Note: Data in this table is from end-of-program surveys only.

IHS participants were consistently less likely to see these influences on their career planning, though a majority still saw positive influences in all areas except getting to know the kind of work they wanted to do, or seeing a transit career as a real possibility. IHS participants had more positive responses with respect to immediate steps such as working to developing work skills, motivation to go to college, or taking classes that will contribute to a positive career. A large majority of IHS respondents also perceived DO IT! as contributing to their confidence and career expectations.

In summary, participating in DO IT! presentations was clearly perceived as a contribution to career planning and opportunities by the large majority of participants in all three partner settings. Furthermore, the program offered different opportunities that met the needs of participants at different stages in their own career development.

# INTERNSHIP IMPLEMENTATION AND EXPERIENCE

The opportunity to compete for an internship was seen as an important motivator for DO IT! participation. Table 10 displays survey responses concerning the importance of different motivations students may perceive with respect to applying for a VTA internship. Clearly, the great majority of program participants saw these factors as appealing, with some differences related to their stage in the career development process. Most FC participants, for example, did not see having "something productive to do for the summer" as an incentive to seek an internship.

<sup>&</sup>lt;sup>a</sup> Percentage of respondents stating "definitely yes" or "pretty much."

Overall the internship program was seen as a positive opportunity by program participants, but as shown earlier in this report (see Table 6) the great majority of participants did not decide to apply for an internship. Approximately 15% of IHS and FC participants were motivated to actually apply. SJJC participants were the exception, where nearly half reported being motivated to apply. The internship in itself apparently does not necessarily fit the circumstances and motivations of most of the participants. However, that does not mean it is not an important program component, attracting interest and a representing a positive opportunity that may draw participants to the program.

Table 10. Respondent Perception of an Internship Opportunity<sup>a</sup>

Perception of an Internship Opportunity	Independence High School	San José Job Corps	Foothill College
an opportunity to learn professional skills.	100.0%	97.4%	81.8%
a chance for a paid internship.	95.9%	86.9%	90.9%
learning about career options I might like.	97.3%	94.7%	100.0%
learning specific job skills.	97.3%	97.4%	90.9%
applying the skills I have learned in school.	91.2%	97.4%	81.8%
public transit can improve the community.	75.5%	89.5%	90.9%
a chance for an internship that leads to a job.	93.9%	92.1%	100.0%
something productive to do for the summer.	86.4%	81.6%	45.5%
practice my work skills.	97.3%	NA	81.8%
get a start in a career that I am interested in.	98.0%	NA	90.9%

<sup>&</sup>lt;sup>a</sup> Percentage of respondents who described each item as "very important" or "important."

# **Managing the Internships**

Although the scope of this evaluation did not include evaluating the actual work completed by interns, interviews with VTA mentors and interns reveal positive assessment of the experience for interns, and of the contributions interns make to VTA. VTA deployed their interns in a variety of ways, creating a multifaceted experience with potentially rich benefits for each of them. Interns expressed appreciation of the variety of work experience and guidance they received. The general structure of the internship is to pair each intern with a mentor, who formulates individual assignments that are tailored to the skills, interests, and potential of the intern. Additionally, all of the interns worked as a team on a pair of group projects.

Overall, the internships provided broad exposure to different facets of work at VTA. For example, one intern's responsibilities included work on the group projects, helping to create drafts of a sustainability report for VTA and a sustainability plan for the City of San José, participating in meetings of the Bay Area Sustainability Working Group (comprised of representatives of other major area transit agencies), helping to develop VTA's "green construction" certification process, and development of a VTA policy for environmentally preferable procurement. In addition, several interns also attended the CalGIS Conference held in Oakland in May, 2017.

The mentors advised their interns, helping them to learn various aspects of formal and informal work protocol. For example, one intern initially wore inappropriate clothing and seemed to project a less-than-amiable presence; his mentor worked with him to adopt a more conventional (but not necessarily conformist) approach to these matters. In interviews, each intern spoke glowingly of the direction and instruction they received from their VTA mentors.

On August 15, 2017, the interns made a presentation to VTA staff, which was very well received. On October 4, 2017, VTA organized an event to which representatives of DO IT! partner organizations, involved VTA staff, and other interested stakeholders were invited to hear a presentation from interns and celebrate the conclusion of the program. SJJC and FC interns gave a PowerPoint presentation highlighting their individual and group work. (IHS interns had already departed for college.) In addition, the interns presented to the Executive Staff at VTA on October 24, 2017. This event was also well received and led to a final presentation to Supervisor Ken Yeager, who represents the district associated with the Complete Streets Project.

Individual presentations identified the many contributions each intern had made to ongoing VTA projects, e.g., zero-waste activities, SR 85 Transit Guideway Study, litter and roadway aesthetics studies, and more. The interns' roles included data organizing and analysis, GIS work, and contributions to meetings. These activities provided learning in the application of skills they were developing (e.g., GIS), as well as introduction to new skills.

The second part of the presentation focused on a group project designed to immerse the students in a realistic transit planning exercise. The visual displays were excellent, focusing on the products of a planning program for rebuilding a major local thoroughfare (Bascom Project), including realigning driving lanes, adding bike lanes, adding parking lanes, improving pedestrian walkways, improving transit access, and adding landscaping. The presentation carefully linked these elements of the project to the data that had been analyzed to support them, and the ambiance, safety, economic development, and environmental benefits they would produce. It was an impressive demonstration of the skills development and career advancement results of the DO IT! program. Mentor comments through interviews confirmed these results. Mentors noted the growth experienced by specific interns, the contributions they had made, and the possibilities of future employment at VTA or other transit agencies. The confidence, sense of achievement, and enthusiasm of the presenters was evident.

Without doubt, VTA's extensive experience with managing internships provided an excellent base from which the program could succeed, further buttressed in most cases by the experience of the mentors as former VTA interns themselves. VTA mentors also received formal training from the VTA Organizational Development & Training Department as well as a more specialized preparation session from DO IT! program management.

## **Internship Implementation Outcomes**

This study does not provide an evaluation of the interns as workers, but rather focuses on aspects of the internship experience that might provide insights for future implementers of similar programs. Of course, the internship program was not without its difficulties, and awareness of these issues may improve the design and implementation of similar programs. Many of these issues are related to the differences between the age, work experience, and skill levels of interns from the three partner organizations, as well as the different immediate expectations these various participants held with respect to the intern experience. Some key issues and outcomes are discussed below.

## **Limited Availability for IHS Interns**

Interns from IHS were more constrained with respect to the number of hours they could contribute to the internship; as they were admitted to college in the fall, they also had to end their internships before the program formally ended in October, 2017. Internship responsibilities and expectations had to accommodate these limitations.

## Mixing Experience Levels was a Challenge for Some

Among their many duties, the interns collaborated on two group projects staffed with their fellow interns. Generally, these projects seem to have resulted in positive outcomes, although interviews with the interns suggest that the mixing of ages and work experience were sometimes a challenge for the more advanced interns, who were more focused on their own job performance and improving their opportunities for employment.

## **Benefits for Interns Linked to Background**

The benefits that each intern received from the program were linked to his or her background. As a rule, the high-school interns obtained a more general introduction to a professional workplace and public transportation that would benefit them in the longer term, while the more advanced students sought specific, skill-related experiences that would help them get better prospects for immediate employment in the industry and related fields.

## **Benefits for VTA Linked to Background**

Similarly, VTA obtained different patterns of benefits from each intern; as stated earlier, the interns from FC and SJJC tended to have more job-ready skills that can be beneficial to VTA performance. In contrast, the IHS interns provided a diverse and learning-oriented presence to the agency. They benefited from an experience rich with learning opportunities in a variety of areas. This function of the intern program brought different rewards to both mentors and interns, and can bring its own challenges in the work place.

## Preparation and Maturity can be a Challenge

Neither high-school intern continued their internship beyond August 2017; both moved on to college. One intern in particular would not have continued with the VTA internship regardless of his intentions to transition to college due to his failure to respond to positive reinforcement and applicable feedback to his substandard work ethic. Although the intern was able to contribute to group project work, it was often with a lackadaisical attitude. This outcome further highlights the risks and rewards associated with different kinds of applicants. Some high school students, despite their great promise for later achievement, may not be mature enough to handle the demands of a professional position. Nevertheless, each intern had a positive and beneficial learning experience.

## Summary

In summary, the internships were clearly a positive asset to the DO IT! program. They provided interest and opportunity for both participants and VTA. However, in the model adopted by VTA, there were a certain number of trade-offs in selecting interns and managing the internships. For example, the program sought to prioritize strengthening opportunity for disadvantaged participants, yet also sought to give more advanced students an opportunity. Advanced applicants had skills more appropriate to some positions that were available in the internships. Additionally, some more advanced participants reported that the benefits and learning opportunities were stronger for the younger interns in some of the group work settings. Future implementers of such a program may wish to note which goals of these internships they seek to maximize by means of selecting partners and participants.

The lesson here is not that these different uses of the intern experience need to be resolved, but that they can be more fully recognized and addressed in the planning and implementation process. For example, the original program design did not foresee the recruitment of DO IT! interns from FC, yet FC participants had the highest percentage of success in being selected, and those interns seemed to be the most likely to seek to attain full-time employment at VTA in the near term. This was presumably because their skills and experience best fit the needs of some of the limited number of intern positions. The fit between intern opportunities and the target participant pool should be closely coordinated in planning a program.

# VII. DO IT! EVALUATION: ACCOMPLISHMENTS AND LESSONS

### **ACCOMPLISHMENTS**

Overall, the DO IT! program was successful in attaining its goals. These accomplishments included:

 VTA successfully identified partner educational institutions with students who were appropriate to the project's objectives.

IHS was the major partner, providing access to a student population with a significant portion of less-advantaged, underserved, and minority students who might benefit from the Do IT! experience. SJJC was also a planned partner, providing access to a diverse and often less-advantaged population that were somewhat older, but could benefit from the program in ways similar to IHS students. Strong cooperation and support by IHS staff involved in the STEAM program and the technical interests of STEAM students produced robust participation in the program, accounting for three-quarters of the total participants.

The addition of FC as a location of participants came later in program implementation as partner roles evolved. Learning as the program advanced, VTA determined that FC could play a primary role since 1) they were in a location that attracted students from the demographic base the DO IT! Grant was intended for, 2) FC students were in a better position to transition to full time work, and 3) FC had a GIS program that would further attract students interested in transportation. Collectively, these lessons help create an understanding of how high schools, job corps and community colleges across the nation could play roles in future similar programs.

2. VTA developed a practical approach to convey information about career opportunities in transportation.

VTA's approach to conveying information about career opportunities to participants involved three major elements. First, VTA worked with partners to identify existing and relevant curricula (courses) that were in place, and focused VTA outreach on students taking those courses. In some cases, particularly IHS, this work was augmented with topics more closely related to the VTA transit planning career path. This was accomplished largely by input from VTA mentors, who demonstrated a good sense of the needs of each group of partner students. For each partner, the curriculum was related to organizations for students that focused on skills or careers relevant to transit planning – the STEAM Academy at IHS, the Transit Workers Union at SJJC, and, less clearly, the GIS certificate program at FC.

Second, VTA provided presentations on campus, or in one case for IHS at VTA, concerning the transit-planning career path. These presentations were well designed to introduce participants to potential mentors. Staff participants conveyed personal stories on initiating a career at VTA to which students could relate, conducted hands-on demonstrations of interesting high-tech approaches for increasing the utility of the transit system, and answered questions.

Finally, extracurricular materials concerning transit careers and skills were made available to program participants. VTA provided information to program participants on links/locations of a variety of internet materials relevant to transit careers. IHS participants reported the most of use of these additional materials, suggesting that this kind of general information on career options was of particular value to the participants who were early in their career planning.

Survey responses and interviews with participants confirmed the success of this information and engagement approach. Participants in all three partner organizations reported positive influences on their own motivations and engagement in career preparation. Furthermore, they reported getting specific benefits that were most suited to their particular point on their own career path. This meant more interest, enthusiasm, and motivation to find and prepare for a career. Older students were more likely to focus on the specifics of beginning a career in transit, possibly with employment at VTA.

### 3. VTA developed a strong internship program.

VTA put in place a DO IT! internship that provided motivation to participate in the educational program and met diverse needs of program participants from each of the partner programs.

The intern selection process included three more advanced participants (of five interns) who were potentially ready for employment at VTA. In a relatively immediate sense, this is a contribution to the program intention to help meet VTA's desire to strengthen recruitment of qualified, local residents. In the long term, the program has increased awareness and some interest in a transit career among IHS participants. This suggests that a sustained program may improve the prospects for VTA recruiting more local residents into their professional workforce.

The DO IT! program clearly had positive effects on career awareness and career-relevant-skills development for many participants. As stated by one interviewee, it provided a "ladder of opportunity" to participants who may not otherwise have had this ladder.

#### LESSONS LEARNED AND OPPORTUNITIES

As summarized above, the DO IT! program was quite successful in meeting its overall implementation goals, and in providing career development opportunities for a substantial number of youth and young adults who may not have had these opportunities without the program. The MTI evaluation was designed as a process evaluation that would provide lessons learned and recommendations for improvement in an innovative program. The remainder of this section will focus on this charge.

The program initiation phase, in which the design of the program and the roles of collaborating partners needed to be identified, was particularly challenging. This is not unusual for new programs. DO IT! included a program concept new to VTA – working with local educational and job training organizations to provide opportunity and encourage interest in a transportation planning career among less-advantaged youth within the community. VTA's successful grant proposal outlined a general approach to doing this.

However, as with any innovative program, important details had not been specified, and this had to happen during the first months of program initiation. The evaluation identified several challenges that had to be addressed in this phase.

## 1. Review and refine program goals and implementation processes.

Initiation of DO IT! following the grant award was initially hampered by a lack of clear and systematic planning that would refine and provide implementation guidance for VTA and partners. In particular, there was little development of how the recruitment and education/ training processes carried out by partners would contribute to program objectives as stated in the grant proposal. As documented earlier in this evaluation report, details on partner roles and program implementation were not communicated to partners. Examples included vague curriculum expectations, no clear definition of program participation, few details on the internship (how many, duties, pay, etc.), lack of explicit role definitions across partners that had very different capacity and operations, and no scheduling of planning or orientation meetings for partners.

Recommendations: These initial planning and program initiation challenges generated important lessons for sustaining or replicating programs similar to DO IT! The primary lesson was that a complex collaborative program requiring complementary roles for partners will greatly benefit from an early and proactive planning process initially organized and led by the lead agency.

In summary, careful and systematic articulation of the logical relations between program intent and implementation processes appropriate to each partner is important for timely and effective implementation of an innovative program like DO IT! It is important to have a strong program logic that supports explicit objectives that guide activities and resource allocation.

### 2. Actively develop collaboration with partners.

A collaborative approach involving partners in the education system and transportation sectors was important to making the DO IT! program work, particularly on a very limited budget. Indeed, developing strong collaboration from the very beginning of program initiation is critical to the kind of planning discussed above. The partners need to be able to share what they can feasibly bring to the table, the constraints on what they can do, and their own ideas about the best way to serve and involve their participants. Shared goals and understandings of program purpose and roles are important attributes of successful collaboration.

VTA quickly made management changes that improved implementation of the program over time, but a regular and strong collaboration between partners is essential for program effectiveness. Roles were often defined out of necessity and circumstance, not systematic advance planning. The individually developed roles of each partner were a contributor to some of the early tensions in prioritizing program intentions (e.g., degree of focus on participant career awareness and learning versus meeting VTA workforce needs) that faced VTA staff (e.g., in selecting interns). Fortunately, as detailed in the report, the new VTA management team took concrete steps to address these roadblocks.

Recommendation: Create a strong, well-planned collaborative framework from the beginning. Collaboration among new partners in an innovative program such as DO IT! requires clear and frequent communication that provides explicit information, responsive communication with respect to gueries and requests for guidance, appropriate forums for sharing information and ideas, and a decision process that incorporates the ideas and needs of all partners. The foundation for effective collaboration should be laid soon after grant notification with a face-to-face "kick-off" meeting of all partners. This meeting should include self-introductions of partners and a review of the grant purposes, requirements, and program logic including target population, program components, and partner roles. The meeting should be interactive and focus on building shared understanding and commitment to the program. Decisions should involve all partners and meet the individual needs and capacities of partners as much as possible. Agreement on continuing communications, contact points, and regular meetings (not necessarily face-to-face) should be reached. This kind of collaborative framework is important to avoid uncertainty, delays, and ad hoc decision making. In addition, the collaborative involvement and scheduled networking of partners will hold the grantee agency accountable and can mitigate any negative impact that may be caused due to staff turnover.

## 3. Ensure appropriate staffing.

The DO IT! program experience clearly demonstrated the importance of ensuring staffing that meets the distinct requirements of an innovative program that involves community outreach and collaboration. The management and work skills required in a program like DO IT! are not the day-to-day skills required for meeting VTA's transportation planning and service needs, and they require ensuring that staff assigned to the program have the understanding, motivation, and skills to fulfill the necessary duties.

DO IT! required a fluid, responsive, and interpersonal style that would facilitate an innovative, collaborative effort. Experience and awareness of effective collaborative management is important to a program such as DO IT! The DO IT! program took off when changes in leadership brought an effective, collaborative style to the program.

DO IT! provides positive lessons about the importance of proper staffing. The VTA staff presentations that became the center of the training/education component of the program were successful in no small part because of the enthusiasm and skill of the staff that gave them. The mentors for the internships drew strong praise from their mentees. Interviews with staff indicated that the opportunity to be involved in these outreach efforts working with young people was very fulfilling. Awareness of this sort of institutional resource can translate into an innovative and effective program, as it did for the VTA.

Recommendation: It is important to fully recognize the importance of staff skill and commitment for successfully planning and implementing an innovative and collaborative program in the community. Staff should be carefully selected. Ideally, they should be involved in the development of the program (e.g., proposal planning if funding is through a grant). Staff brought in later should be thoroughly briefed on program history, objectives, and plan. They should have the necessary interpersonal skills, and be committed to program concept and purpose. Staff should be involved in regular program review and discussions of program issues and recommendations for improvement.

### 4. Monitor, assess, and revise the innovation.

The DO IT! project embraces multiple goals and objectives. For the Santa Clara County community, it seeks to increase awareness of well-paying local career opportunity, to proactively improve career options for disadvantaged youth, to help diversify the backgrounds of the transit workforce, and to build a transit workforce rooted in the community. For youth participating in the program it seeks to improve career awareness and options, especially in transit. Making internships available to participants was a particularly important example. For VTA, it seeks to build a workforce committed to the community, attract skilled employees, and support promising interns that may help VTA meet its workforce needs.

To some extent, these wide-ranging goals may conflict. They may imply different target audiences and require different services. Furthermore, different partner organizations and participants may be appropriate to some of these goals more than others.

Recommendations: Innovative programs are by definition opportunities for learning. Program performance should be regularly monitored, program activities should be observed and documented, and feedback should be regularly gathered from participants, partners, and staff. These data should be reviewed, findings should be summarized (e.g., similar to progress reports as prepared by MTI for DO IT!), and implications for the program should be discussed by grant management and by partners in collaborative meetings. When appropriate, program objectives or program implementation may be revised to reflect lessons that have been learned. This attention to program experience is critical to program improvement and sustainable innovations.

## **APPENDIX: SURVEY DETAILS**

Intake survey for Independence High School with raw results.

טט	11!	intake	Survey	

Reference ID (leave blank): \_\_\_\_\_

Class period (circle ONE): 2 3 4 5 6 7

**Current Engineering Teacher (circle ONE): Aiello Briber Johnson** 

First name: Las	st name initial (one letter):
-----------------	-------------------------------

#### Welcome to DO IT!

The DO IT! Program has been designed to help you prepare for a good career, and to help the Santa Clara Valley Transit Authority (VTA) hire employees that will best meet the public transportation needs of all members of our community. By completing this simple questionnaire, you will help us understand who is in the program, your career plans, and how we may best meet them. Your answers will not be used for selecting interns. Answers will be compiled by an independent team and reported in statistical tables with no information that identifies you.

## Your Thoughts about a Career

Please answer the following questions about your career plans. There are no better or worse answers, many successful adults did not know when they were in high school that they would be in their current careers. Just check the answer that best fits how you feel right now.

Question	When I think about my future career, I	Mean	Std. Dev.	1 Definitely Yes	2 Pretty Much	3 Don't Know	4 Not so Much 5 Definitely No	Blank
1Q1.1	know the kind of work that interests me	1.82	0.72	35.37%	48.30%	14.29%	1.36%	0.68%
1Q1.2	am very interested in learning about different careers	2.05	0.78	25.17%	46.26%	25.17%	2.72%	0.68%
1Q1.3	need more information	2.01	1.02	38.78%	31.29%	19.05%	9.52%	1.36%
1Q1.4	feel excited	1.92	0.86	38.10%	31.97%	26.53%	1.36%	2.04%
1Q1.5	feel worried	2.59	1.17	20.41%	27.21%	29.93%	21.09%	1.36%
1Q1.6	know exactly the job I want	2.67	1.07	16.33%	23.13%	36.73%	19.73%	4.08%
1Q1.7	work in public transit sounds like a possibility	3.41	0.98	2.04%	13.61%	39.46%	42.18%	2.72%

Question	When I think about my future career, I	Mean	Std. Dev.	1 Definitely Yes	2 Pretty Much	3 Don't Know	4 Not so Much 5 Definitely No	Blank
1Q1.8	am anxious to decide on a career	2.58	0.98	10.88%	38.78%	32.65%	15.65%	2.04%
1Q1.9	want to take time and be sure of what I want	1.92	0.89	36.05%	40.14%	17.01%	5.44%	1.36%
1Q1.10	don't care, there is plenty of time	3.83	0.95	2.04%	4.76%	27.21%	64.63%	1.36%
1Q1.11	am confident that I will have a good career	2.17	0.80	21.77%	41.50%	32.65%	2.72%	1.36%
1Q1.12	want a job near the community I grew up in	2.47	0.96	19.05%	27.21%	42.86%	10.20%	0.68%

Question	After high school I plan to	Mean	Std. Dev.	1 Definitely Yes	2 Pretty Much	3 Don't Know	4 Not so Much 5 Definitely No	Blank
1Q2.1	Attend a two-year college	2.73	1.28	21.77%	21.09%	25.85%	28.57%	2.72%
1Q2.2	Attend a four-year college	1.60	0.83	57.14%	26.53%	11.56%	2.72%	2.04%
1Q2.3	Attend a career-training program	2.81	0.97	10.20%	21.09%	48.98%	17.69%	2.04%
1Q2.4	Enter the military	3.77	1.15	4.76%	7.48%	27.21%	58.50%	2.04%
1Q2.5	Look for a job	2.26	1.09	24.49%	40.82%	21.77%	10.88%	2.04%
1Q2.6	Take some time to decide what to do	2.97	1.11	7.48%	27.89%	35.37%	27.21%	2.04%
1Q2.7 & 1Q2.7TEXT	Other (Specify)	3.47	1.61	4.76%	0.68%	4.08%	10.88%	79.59%

Question	My skills in the following areas are	Mean	Std. Dev.	1 Excellent	2 Good	3 Okay	4 Weak	5 None	Blank
1Q3.1	Verbal communication	2.23	0.88	23.13%	37.41%	32.65%	6.80%	0.00%	0.00%
1Q3.2	Written communication	2.32	0.79	15.65%	41.50%	37.41%	4.76%	0.00%	0.00%
1Q3.3	Working with data and numbers	2.35	0.93	16.33%	45.58%	25.85%	9.52%	2.04%	0.68%
1Q3.4	Being reliable / having good attendance	1.75	0.82	44.90%	38.10%	12.24%	4.08%	0.00%	0.68%
1Q3.5	Using computers / word processing and publishing	2.22	1.00	25.85%	39.46%	24.49%	7.48%	2.72%	0.00%
1Q3.6	Using computers / data and numbers	2.27	1.01	25.17%	36.05%	27.21%	9.52%	2.04%	0.00%

Question	My skills in the following areas are	Mean	Std. Dev.	1 Excellent	2 Good	3 Okay	4 Weak	5 None	Blank
1Q3.7	Using computers / graphics and design	2.50	1.02	19.05%	29.25%	36.73%	12.24%	2.72%	0.00%
1Q3.8	Working with others	1.90	0.79	33.33%	46.26%	16.33%	3.40%	0.00%	0.68%
1Q3.9	Creative thinking	2.22	0.92	25.17%	36.73%	29.25%	8.84%	0.00%	0.00%
1Q3.10	Business communication	2.78	1.07	11.56%	28.57%	36.73%	16.33%	6.80%	0.00%
1Q3.11	Working with tools and equipment	2.24	0.92	22.45%	40.82%	28.57%	6.80%	1.36%	0.00%
1Q3.12	Logical thinking and problem solving	2.04	0.79	25.85%	47.62%	23.13%	3.40%	0.00%	0.00%
1Q3.13	Being a self-starter / taking initiative	2.48	1.02	18.37%	32.65%	33.33%	12.24%	2.72%	0.68%
1Q3.14	Being on time	1.78	0.85	45.58%	34.01%	17.01%	3.40%	0.00%	0.00%
1Q3.15	Office etiquette / knowing how to act in an office	1.86	1.03	44.90%	35.37%	12.24%	3.40%	4.08%	0.00%

Question	In thinking about applying for an internship like "DO IT!," how important are the following?	Mean	Std. Dev.	1 Very Important	2 Somewhat Important	3 Not Very Important	4 Not at all Important	Blank	1Q4.T1 - 1Q4.T3	Frequencies
1Q4.1	An opportunity to learn professional skills	1.17	0.38	82.99%	17.01%	0.00%	0.00%	0.00%	1	20
1Q4.2	A chance for a pain internship	1.43	0.59	61.90%	34.01%	3.40%	0.68%	0.00%	2	12
1Q4.3	Learning about career options I might like	1.33	0.53	69.39%	27.89%	2.72%	0.00%	0.00%	3	6
1Q4.4	Learning specific job skills	1.33	0.51	68.71%	28.57%	2.04%	0.00%	0.68%	4	10
1Q4.5	Applying the skills I have learned in school	1.53	0.66	55.10%	36.05%	7.48%	0.68%	0.68%	5	5
1Q4.6	Public transit can improve the community	1.97	0.76	28.57%	46.94%	21.09%	2.04%	1.36%	6	1
1Q4.7	A chance for an internship that leads to a job	1.32	0.56	71.43%	22.45%	4.76%	0.00%	1.36%	7	15
1Q4.8	Something productive to do for the summer	1.66	0.74	48.30%	38.10%	11.56%	1.36%	0.68%	8	5
1Q4.9	Practice my work skills	1.33	0.51	68.71%	28.57%	2.04%	0.00%	0.68%	9	7
1Q4.10	Get a start in a career that I am interested in	1.29	0.48	71.43%	26.53%	1.36%	0.00%	0.68%	10	16

Question	Please indicate whether you have taken, are in, or plan to take the following courses	Mean	Std. Dev.	1 Have Taken	2 Am Now Taking	3 Plan to Take	4 Probably Will Not	Blank
1Q5.1	INTRODUCTION TO DESIGN Grades 9 and 10	1.76	0.96	48.30%	36.73%	1.36%	11.56%	2.04%
1Q5.2	COMPUTER INFORMATION TECHNOLOGY Open to any grade	3.33	0.98	10.88%	2.04%	25.85%	54.42%	6.80%
1Q5.3	ENGINEERING DESIGN AND DEVELOPMENT Grades 11 and 12	2.62	1.00	15.65%	25.17%	33.33%	20.41%	5.44%
1Q5.4	STATISTICS AP (Advanced Placement) Open to any grade	3.53	0.74	3.40%	3.40%	26.53%	59.86%	6.80%

## Finally, please tell us a little about yourself: (frequencies reported)

Age:	
13	0
14	11
15	23
16	55
17	57
18	10
19	1

Gender:	
М	133
F	23
Blank	1

City you live	in:
San Jose	158

Grade Level:	
9th	13
10th	30
11th	57
12th	55

- I am now eligible for a free or reduced-cost lunch:
  - ° Yes 70
  - ° No 74
  - ° Blank 13
- Race (Check all that apply):
  - ° Asian 93
  - ° Black / African American 7
  - ° Native Hawaiian / Pacific Islander 7
  - ° Native American / Alaskan Native 3
  - ° White 8
  - ° Arabian 1
  - ° Don't Know 7
  - ° Decline to State 7
  - ° Multi-Race 8
  - ° Blank 16
- Ethnicity (Check all that apply)
  - ° Hispanic 43
  - ° Non-Hispanic 72
  - ° Don't Know 8
  - ° Decline to State 10
  - ° Blank 24

## **ENDNOTES**

- 1. J. Pressman and A Wilawsky, (1973), *Implementation: How Great Expectations in Washington are Dashed in Oakland*, Berkeley, CA: University of California Press.
- 2. David Bonilla. "DO IT! Curriculum for Training Transportation Planner Aides (Interns)." October 26, 2016.

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Pressman, J. and A. Wilawsky. (1973). *Implementation: How Great Expectations in Washington are Dashed in Oakland*. Berkeley, CA: University of California Press.

## **ABBREVIATIONS AND ACRONYMS**

DO IT!	The Discover Opportunities - in Transit
FC	Foothill College
FTA	Federal Transportation Administration
GIS	Geographic Information System
IHS	Independence High School (San José)
MTI	Mineta Transportation Institute
SJJC	San José Job Corps
STEAM Academy	Science, Technology, Engineering, Arts, and Mathematics Program at Independence High School
VTA	Valley Transportation Authority

## **ABOUT THE AUTHORS**

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Dr. Peter Haas is an emeritus professor at San José State University and served as Education Director of the Master of Science in Transportation (MSTM) program at the Mineta Transportation Institute (MTI) from 2001-2017. He earned a PhD in Political Science (Public Policy and Public Administration) from the University of North Carolina at Chapel Hill in 1985. A former director of the SJSU Master of Public Administration program, he also has consulted at every level of government and for nonprofit agencies. As a Research Associate for MTI, Dr. Haas has authored numerous reports and other publications covering transportation, including topics relevant to high speed rail workforce development and station planning, as well as transportation finance and tax initiatives. Haas is also co-author (with team member J. Fred Springer) of two editions of the text *Applied Policy Research: Concepts and Cases*.

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