

**AMERICAN PUBLIC TRANSPORTATION ASSOCIATION**

**Credentialing Options for the Transit Industry**

**Full Report**

**August 14, 2018**

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**FINAL DRAFT**

**AMERICAN PUBLIC TRANSPORTATION ASSOCIATION**

**Credentialing and Certification Options for the Public Transportation Industry**

**Executive Summary**

**August 2018**

# Credentialing and Certification Options for the Public Transpiration Industry

## Executive Summary

### *Introduction*

The American Public Transportation Association is charged with broadening the base of new credentialing and certification models for the public transportation industry that will prove to be both valuable to the membership and profitable to the association. This report provides APTA leadership with models for consideration, as well as the information they need to decide whether to move forward with any of these options. Each credentialing and certification option outlined in the report includes details about the potential credential or certification, feedback received from APTA members and staff, a timeline, potential costs and implementation steps.

#### Defining Credentials

The report begins by differentiating between the three most common types of credentials issued by associations. These include:

* **Assessment-based Certificate**: With an assessment-based certificate, individuals must show they have achieved a set of learning objectives through an education or training process. Individuals who earn the certificate must show mastery of the learning objectives by passing an assessment upon completion of the program.
* **Certification:** A certification reflects attainment of established criteria for proficiency in a profession or occupation and is granted following successful performance on an assessment measuring an individual’s knowledge, skills and abilities (competencies). It is based on a scientific study of a specific job or practice and is associated with a high-stakes exam or performance requirement.
* **Digital Credential/Badge:** A digital credential/badge is a newer type of credential that has developed with changing technologies. It can be issued along with a certificate or certification as another way of demonstrating that an individual has earned that credential.

There are several crucial factors critical to the success of new credentials or certifications that an organization new to issuing credentials should consider. The credential should have labor market value; be connected to a set of competencies; be priced in such a way that it supports the staff time required to manage the credentialing processes; be affordable to employers who will be supporting their employees earning the credential; and be easily accessible to those interested in pursuing the credential.

As part of developing the credentialing and certification options in this report, APTA hired a Credentialing Consultant who assisted APTA, under the advisement of APTA’s Certification and Credentialing Advisory Group (members are included in Appendix A) and APTA’s staff Subject Matter Experts (SMEs, included in Appendix B). The Credentialing Consultant conducted thorough research, including review of the Transit Cooperative Research Program’s (TCRP) 2011 Report: *Professional Certification and Credentialing Program for the Transit Industry.*

Four credentialing options are detailed in this framework.

### *Assessment-based Certificates*

**Option #1: Develop a high school-level, transit-focused Career and Technical Education (CTE) course that results in an assessment-based certificate to help build a new generation of transit workers.**

**Career and Technical Education** provides students of all ages with the academic and technical skills, knowledge and training necessary to succeed in future careers and to become lifelong learners. In total, about 12.5 million high school students are enrolled in CTE programs across the nation. CTE prepares these learners for the world of work by introducing them to workplace competencies and makes academic content accessible to students by providing it in a hands-on context.

With a transit CTE credential, these high school graduates can move directly into entry-level transit jobs or they can enter post-secondary education to receive additional education for those positions in industries that require it. The CTE course would be a yearlong program that would utilize the National Transit Curriculum for content. APTA would develop the instructor and student materials, as well as the assessment, with the assistance of an instructional design firm. The association would also issue the credential. Local transit agencies would form partnerships with their local school districts, with specialized support and training from APTA staff. The APTA Certification and Credentialing Advisory Group and staff are enthusiastic about this prospective course and credential to build the next generation of transit workers.

* Timeline: One year
* Total Investment: $142,000-$200,000 plus related internal costs (APTA staff labor and G&A)

**Option #2: Develop a Transit Fundamentals e-learning course that results in an assessment-based certificate for employees who are new to the transit industry.**

A Transit Fundamentals e-learning course would enable new transit employees to develop a set of foundational competencies and a better understanding of the industry, as well as the opportunity to earn a credential. Benefits to APTA member agencies include saving them training dollars by alleviating the need to develop, implement and keep their own programs up-to-date; providing new employees with a broader perspective of the transit industry that goes beyond any one agency’s footprint; and strengthening the competencies of those new employees.

This prospective course and credential dovetails with APTA’s e-learning initiative, for which APTA’s Workforce Development staff is developing transit related e-learning modules, with extensive feedback from agency CEOs. The e-learning credentialing option detailed in this report appeals to APTA’s Certification and Credentialing Advisory Group and APTA staff since the credential would be easily accessible. This option also lends itself to the development of “add-on” credentials down the road on topics of broad appeal and importance, such as security.

* Timeline: 8-12 months
* Total investment: $123,500-$185,000 plus related internal costs (APTA staff labor and G&A)

**Option #3: Develop a Transit Cybersecurity course that results in an assessment-based certificate for transit managers, supervisors and CEOs.**

In today’s world, cybersecurity threats are real. Yet, at this time, there is no credential or certification designed specifically for transit agency managers, supervisors and CEOs who play essential leadership roles in ensuring this issue is addressed. APTA’s creation of a specialized cybersecurity credential would be an important first step in helping the industry move in the direction of creating a culture of cybersecurity, just as it did with safety.

To maximize impact, this assessment-based certificate program would utilize a hybrid learning approach. Interested managers, supervisors and CEOs would complete pre-work in advance of an in-person training program that would include an internal cybersecurity assessment and pre-reading of relevant materials. They would then attend a one-day training program followed by action planning and an assessment in order to earn the Transit Cybersecurity credential.

* Timeline: 6-9 months
* Total investment: $53,500-$70,000 plus related internal costs (APTA staff labor and G&A)

### *Certification*

**Option #4: Launch a mobility management certification program that includes two levels, one for mid-level and the other for senior-level professionals.**

Option #4 is a certification that builds on *Competencies for the Practice of Mobility Management*, an effort by the National Center for Mobility Management (NCMM), of which APTA is a consortium member. The competencies outline the knowledge, skills and expertise for the growing field of mobility management. APTA and its NCMM partners could utilize the mobility management competencies as a starting point for developing a mobility management certification program. These core competencies would add a level of rigor and professionalism to the emerging field of mobility management. Given that a set of competencies exists, this would make the process for developing and implementing the certification program less intensive than a brand new certification. Ideally, the mobility management certification program would support two occupations: one for Mobility Managers, and a more senior, strategic level for Innovation Officers.

While a certification would require a more in-depth process and has legal responsibilities associated with it, APTA and NCMM could utilize the expertise of a firm specializing in developing and implementing new certification programs. They would provide the guidance needed for such an endeavor. APTA’s Credentialing Consultant can provide recommendations for reputable organizations that would help to ensure this option’s success.

* Timeline: One year
* Total investment: $130,000-$250,000 plus related internal costs (APTA staff labor and G&A)

In conclusion, APTA has four strong credentialing options to consider, all of which have overwhelming support from APTA’s Certification and Credentialing Advisory Group and APTA SMEs. Even though each will require up-front investment and time, they all have potential to help transform the public transportation industry, build a pipeline of talented workers and improve the knowledge and skills of those already in the industry.

# Full Report

## Setting the Stage

In response to feedback from the previous two APTA Member Surveys, APTA’s 2017-2018 Chair, Nathaniel P. Ford Sr., has set several key priorities for the association. One of these is that in order to prepare for a new mobility paradigm, public transportation needs the best and the brightest skilled workforce. As part of this effort, APTA is charged with broadening the base of new credentials for the transit industry that will prove to be both valuable to the membership and profitable to the association. APTA recognizes the need to be smart and innovative and to learn from the credentialing journey that many associations have undertaken before them.

The purpose of this report is to provide credentialing models for APTA to consider, including an overview of each credential, benefits to APTA and its members, implementation steps and costs. Since the credentialing marketplace includes a plethora of credentials that are often mislabeled and misunderstood, and which are not of equal quality, this report provides background information on the most common types of credentials issued by associations as well as success factors for new credentials. It’s important that APTA take the road of quality credentials, which will require an investment of time and resources. However, the potential ROI for the transit industry is significant. Finally, the report ends with guidance on how to solicit feedback from the APTA membership on these credentialing models, since buy-in from transit stakeholders is essential to the future success of any credential.

*“This product should provide an excellent roadmap to move forward and set a solid platform for discussing what we should do first.”*

Paul Larrousse, Chair, APTA Workforce Development Committee, Director, National Transit Institute Rutgers, The State University of New Jersey

### *Defining Credentials*

A credential is a term used to describe a type of third-party documentation that recognizes that a person possesses a kind of qualification, competency or authority. It is an “umbrella” term that can mean anything from a certificate of completion for short-term training, to an academic degree, to a nationally recognized licensure. In this report, the word “credential” or “credentialing” will be used in this broad sense. However, when specific types of credentials are addressed, they will be based on the definitions below, which are the most common credentials issued by associations such as APTA.

**Assessment-based Certificate**: With an assessment-based certificate, individuals must show they have achieved a set of learning objectives through an education or training process. This can be done in-person or virtually (e.g. e-learning). Individuals who earn the certificate must show mastery of the learning objectives by passing an assessment upon completion of the program. Once an individual has earned a certificate, he or she has that certificate for life, and it cannot be revoked by an oversight body. Certificates do not need to be renewed. While not all certificate programs require individuals to take an assessment (they may just require attendance or completing an e-learning course), it is recommended APTA take the “assessment-based certificate” route, given the added rigor of such programs and the respect accorded to them by organizations that recognize credentials.

**Certification:** A certification reflects attainment of established criteria for proficiency in a profession or occupation and is granted upon an assessment of an individual’s knowledge, skills and abilities (competencies). A certification is issued by an independent certification body and is valid for a specific time period. It is based on a scientific study of a specific job or practice and requires a high-stakes exam or performance requirement. A certification has ongoing requirements for maintaining proficiency or competency, such as a continuing education requirement, and can be revoked if these requirements are not met.

**Digital Credential/Badge:** A digital credential/badge is a newer type of credential that has developed with changing technologies. It can be issued along with a certificate or certification as another way to demonstrate an individual has earned that credential. For example, if an individual earns an assessment-based certificate, he or she may receive a “paper” certificate as well as a digital “badge.” A digital credential/badge is a representation of an individual’s achievement. Issuance of badges can also be used in less traditional ways, such as to show someone has mastered a small set of competencies on the way to earning a broader credential, such as a degree, certificate or certification. Digital credentials/badges can be authenticated electronically and are typically used in job placement and search applications such as LinkedIn or in an email signature. When employers click on the digital credential/badge displayed in the application or resume, they can see who issued the credential, the competencies achieved and more.

Deciding whether to become a credential issuer is a large step for APTA. This report includes several options that make the most sense for APTA and the transit industry. Below are several success factors for new credentials that are important to consider for an organization new to issuing credentials.

* **The credential has labor market value**. When referring to credentials, labor market value means that earning a specific credential increases a person’s likelihood of obtaining employment. Due to subsequent success of employees hired with the credential, employers eventually perceive that credential as indispensable for entering their industry, or may come to regard it as required or preferred for advancement. Overall, individuals who have earned that credential are deemed more qualified than those who have not.
* **The credential is connected to a set of competencies**. It is important to demonstrate to employers and potential credential earners that a credential is connected to competencies. Earning a credential is about demonstrating that one has gained knowledge, skills and/or abilities, also referred to as competencies, so this should be the foundation. It is not necessary that there be a formal competency model for the industry to join the world of credential issuers, but it is important to show that any credential is tied to competencies to clarify the benefits and value of the credential.
* **The pricing of the credential supports the staff time required to manage the credentialing processes.**  Managing a credential will require staff resources, so it is important that these resource needs are considered in the pricing of the credential. The pricing relates to the first bullet, in that the credential needs to have labor market value to drive the demand for transit professionals to earn it; therefore, bringing in enough income for APTA to sustain the credential.
* **The credential is affordable to employers who will be supporting their employees earning the credential**. While credential issuers must charge a fee to support the staff time required to manage the credentialing process, the fee must be in a range that is acceptable to APTA’s member agencies.
* **The credential is easily accessible to those who want to earn it.** Any credential APTA decides to issue should be readily accessible to the target audiences for which it is designed. That is, the majority of APTA member agencies and their partners should have access to it without having to invest an unreasonable amount of time and resources. Examples of how to make a credential “easily accessible” are utilizing technology as an option (e.g. e-learning) or offering certification testing in conjunction with an APTA conference.

### *Steps Leading Up to Publishing of the Credentialing Options for the Transit Industry Report*

Below are the steps that were followed to complete the *Credentialing Options for the Transit Industry* report. The initiative commenced in February 2018, when a Credentialing Consultant was contracted to assist APTA with considering credentialing options, to write this credentialing report and to present it to APTA leadership.

Step 1: The Credentialing Consultant met with APTA’s Workforce Development staff to gain an in-depth understanding of the goals of the Credentialing initiative.

Step 2: The Credentialing Consultant and APTA hosted an introductory call for APTA’s Certification and Credentialing Advisory Group to hear about the most pressing workforce development and credentialing issues in the transit world. (A list of Credentialing Advisory Group members is included in Appendix A.)

Step 3: APTA and APTA’s Certification and Credentialing Advisory Group participated in a Virtual Credentialing Workshop, hosted by the Credentialing Consultant, to learn about the types of credentials, examples of organizations issuing similar credentials, steps to implement each type of credential, costs and success factors for new credentials.

Step 4: The Credentialing Consultant conducted research to gain insight into the key workforce development issues in the transit industry, as well as APTA’s previous efforts to institute credentialing. This included, but was not limited to, an in-depth study of the Transit Cooperative Research Program; 2011 Report *Professional Certification & Credentialing Program for the Transit Industry*; research of related industry certifications; searches of training providers in the transit industry; review of publications on mobility management; and exploration of APTA Standards.

Step 5: APTA’s Workforce Development staff and the Credentialing Consultant interviewed key industry experts on APTA staff to identify the existing transit credentials within their areas of expertise and to establish whether there might be opportunities to form new partnerships with the credentialing issuers for transit-specific credentials. In addition, discussions took place on potential gaps where APTA might play the role of a credential developer and issuer.

A summary of these interviews, and input from APTA staff, is included in Appendix B.

Step 6: The Credentialing Consultant developed a list of potential credentials for the transit industry and introduced each idea to the APTA’s Workforce Development staff and appropriate APTA industry experts on staff.

Step 7: The Credentialing Consultant presented a summary of *Input from APTA Staff* and the highest potential credentials for consideration to APTA’s Certification and Credentialing Advisory Group. These documents were approved by the Advisory Group.

Step 8: The Credentialing Consultant wrote the *Credentialing Options for the Transit Industry* report. APTA and APTA’s Certification and Credentialing Advisory Group provided comments and feedback before completion of this Report.

### *The Transit Cooperative Research Program’s 2011 Report*: *Professional Certification and Credentialing Program for the Transit Industry*

The topic of credentialing is not a new one for APTA. In April 2011, the Transit Cooperative Research Program (TCRP) published a Scoping Study to identify strategies to establish and maintain voluntary professional development certification and credentialing programs for the transit industry. The goals were to:

1. Identify the range of existing credentials held by transit professionals;
2. Identify gaps in these programs related to the identified needs of transit professionals;
3. Develop a framework of voluntary transit professionals credentialing programs; and
4. Prepare a work plan for the development and implementation of credentialing programs for transit professionals.

The first three goals for the 2011 project are nearly identical to the current 2018 initiative. None of the recommendations in the 2011 report translated into credentialing programs for APTA, though the reasons for that are not the focus of this report. Instead, it is important to note that the recommendations made in 2011 were considered as part of the 2018 initiative.

The TCRP Report explored developing credentials for several highly respected workforce development programs sponsored by APTA and its partners, most of which are still in place today. They include:

* Leadership APTA, a yearlong professional development program for 25 upwardly mobile transit professionals led by transit executives and thought leaders.
* The Eno Transit Executive Seminar, a weeklong course for 25-27 senior transit managers.
* The National Transit Institute (NTI) at Rutgers University, a three-day senior leadership course for future senior leaders in transit.
* The former Transit Studies Program, which allowed 12 transit agency nominees to study transit abroad each year.

As described in the TCRP report, each of these programs did make important contributions to the preparation of transit professionals back in 2011, and continues to do so in 2018. However, there are limitations to repurposing these programs into transit credentials. The programs can be prohibitive to many in the transit industry due to:

* Cost, location and the time required out of the office;
* Their limited focus on individuals moving into leadership positions; and
* The inclusion in each program of only a small number of participating transit employees when considering the footprint of the transit industry as a whole.

As was stated in the 2011 report: “Recent feedback for APTA members has indicated the interest in the availability of a program that reaches and is accessible to the masses that provide public transportation worldwide.”[[1]](#footnote-1) While other workforce development programs have been added since 2011, they are similar in scope and size to the ones above. In addition, each of these programs already takes a considerable amount of time for APTA and the partnering organizations to manage. Adding a credentialing component could make them unmanageable with the resources available.

Part of the 2011 TCRP project included collecting data around credentials, specifically, voluntary certifications of transit professionals. The report included a list of the 10 most common certifications for transit professionals and whether each was required or preferred. For the 2018 Credentialing Initiative, the Credentialing Consultant and APTA SMEs went through a similar process to identify common certifications and other credentials with input from transit industry experts on APTA staff. We expanded this process by also inquiring whether there might be any potential transit-specific, add-on certifications that would make sense for the transit industry. It was determined there wasn’t a need for any add-on certifications, as detailed in the “Input from APTA Staff” appendix to this report.

The TCRP report recommended that APTA utilize its Standards program (APTA Standards and Oversight Council) to serve as a launching point for a transit industry certification. Given the process used to develop the standards, as well as the structure of the Standards Council, it could serve as the governing body for a certification program. The report suggested that APTA start with one area in which standards had been developed, specifically procurement, to use as a test case for a certification program. The current initiative determined this certification is not needed, given the proliferation of other certifications related to procurement. In addition, after consulting with the APTA Standards department, there were no other standards recommended for retooling as certifications at this time.

The next section of the report presents several options for assessment-based certificate programs and certifications for APTA consider.

## Assessment-based Certificate Programs

This section of the report presents two options for assessment-based certificate programs for APTA to consider.

### Option #1: Develop a high school-level, transit-focused Career and Technical Education (CTE) course that results in an assessment-based certificate to help build a new generation of transit workers.

#### What is Career and Technical Education (CTE)?

**Career and Technical Education** provides students of all ages with the academic and technical skills, knowledge and training necessary to succeed in future careers and to become lifelong learners. In total, about 12.5 million high school students are enrolled in CTE programs across the nation. CTE prepares these learners for the world of work by introducing them to workplace competencies and makes academic content accessible to students by providing it in a hands-on context. The high school graduation rate for CTE concentrators is about 90% – 15 percentage points higher than the national average.[[2]](#footnote-2)

The Association for Career and Technical Education (ACTE) has developed some quick facts, several of which are included below, that help define CTE.[[3]](#footnote-3) Each fact is supported by how this could potentially impact the transit industry.

* CTE prepares youth and adults for a wide range of careers and further educational opportunities. These careers may require varying levels of education—including industry-recognized certifications, postsecondary certificates and two- and four-year degrees*. It is common for CTE courses to result in an industry-recognized credential, and one in transit would be desirable for both potential workers and the transit industry.*
* According to the National Center for Education Statistics, almost all high school students earn college credit in CTE, and more than half earn 3+ credits. *These credits can be used towards post-secondary credentials in transit industry career pathways, for which such credentials would be required.*
* The average high school graduation rate for students concentrating in CTE programs is substantially higher than the average national graduation rate. A person with a CTE-related associate degree or credential will earn, on average, between $4,000 and $19,000 more per year than a person with a humanities associate degree. *This increased income helps to build the economic base in the communities in which the transit agencies are located.*
* CTE is at the forefront of preparing students to be college- and career-ready. CTE equips students with core academic skills and the ability to apply those skills to concrete situations in order to function in the workplace and in routine daily activities; employability skills (such as critical thinking and responsibility) that are essential in any career area; and job-specific technical skills related to a specific career pathway*. All of these skills are essential to success in the transit industry.*

#### Why a high school-level, transit-focused CTE course?

With more than 12 million students participating in CTE every year, this is a large pool of potential workers for the transit industry. Some entry-level transit careers require only a high school diploma. With a transit CTE credential, these high school graduates could move directly into entry-level transit jobs where they would receive job-specific training. Because they would already have a solid knowledge base of the transit industry through the proposed high school CTE transit course, these individuals would likely be better prepared to enter the industry than off-the-street applicants. There will be other high school graduates who select career pathways where post-secondary education is required. This could offer an excellent opportunity for partnering with the American Public Transportation Foundation to support those students who are entering post-secondary education.

The transit world would benefit from starting now to grow its next generation workforce. While many agencies rely on recruiting and hiring from a pool of transitioning adult workers, such as those from community organizations or the military, they will retire sooner than a pool of younger workers. By developing a targeted effort focused on the new generation of workers, agencies are creating a longer-term workforce that will eventually produce leaders within the industry. This new generation also has some professional and personal qualities that will greatly benefit the changing transit industry. According to HRTechnologist, members of Generation Z (the generation that is in high school now) want to work for organizations that have a social impact and that prioritize diversity in the workplace.[[4]](#footnote-4) What better industry to match those characteristics than the transit industry?

#### What would such a course and associated credential look like?

High school CTE courses are typically one-year in length and are offered to students as electives. Many times, students not only earn high school credit, but college credit as well. A transit course and associated credential would focus on a foundational set of knowledge-based competencies and could include topics such as:

* The history of public transportation
* The business of public transportation
* Organizational structure and governance of public transportation agencies
* Transit route planning
* Organizational models and transit system stakeholders
* Public transit trends and evolving technology, including mobility management
* Transit careers across the organization

High quality CTE courses integrate an array of hands-on learning opportunities, such as field trips, projects, tours and job shadowing. It is important for transit agencies to partner with local schools that offer the transit course to enable the students to have these types of high-quality learning experiences. A value-added benefit of these types of partnerships is that employers can get to know students who will potentially be entering their workforce.

It is recommended that completion of the transit course would result in an assessment-based certificate issued by APTA. APTA would develop and administer the assessment and issue a credential to students who earn a passing score. There are numerous technology vendors with which APTA can partner that have systems to administer the assessment and issue the credential. Estimated fees for these services are included in the Costs section.

To ensure consistency in how the transit course is taught and the fact that it results in issuance of a credential, instructor and student guides should be developed and provided to the high schools offering the transit course. This is usually welcomed by school districts since not having to develop their own curriculum saves them time and money. Estimated fees for development of the guides are included in the Costs section.

One last area to consider is who would teach the transit course. In many instances, CTE instructors come from within the industry. Sometimes, they are retirees wanting to give back and encourage young people to enter their industry of choice. In some states, they have even developed special teaching certifications so that individuals who are still working in the industry can teach part-time. Requirements vary by state. There may also be teachers within the schools that teach related courses, such as around transportation and logistics.

#### Feedback on This Option

Feedback from APTA’s Certification and Credentialing Advisory Group and APTA staff for the transit CTE course has been tremendously positive. Everyone consulted is on board with the need for the industry to do more to build the next generation of transit workers. Mr. Paul Larrousse, Chair, APTA Workforce Development Committee, and Director, National Transit Institute Rutgers, The State University of New Jersey states, “Our industry is facing the gray tsunami of retirements at all levels. Transit has historically been a career that you ‘fall into’ rather than plan to enter. By establishing a credential at the high school level, we can hope to influence the future workforce's career choice at a much earlier age. Public transportation is an exciting industry with a myriad of jobs that should be attractive to many young folks.“

Advisory Group member Mr. Lester Bryant, [Principal, LWBSolutions,](https://www.aptagateway.com/eweb/DynamicPage.aspx?Webcode=APTAOrgDetailBasic&org_cst_key=4c1b0898-52dc-465a-bf1b-f53e84e34b42)was also enthusiastic about this option and sees it as an important way to build a workforce pipeline. While there are some transit CTE programs to speak of, they are few and far between. This comprehensive effort has the chance to transform the makeup of the workforce and also enables APTA to compete for talent with the many other industries that are already in the CTE arena.

#### Steps to Implement This Option

Step 1: Form a small group (3-5) of transit SMEs who can serve as advisors on the design and development of the transit course. Typically, these would be volunteers of the association who have industry experience and a clear understanding of workforce development. In addition, an APTA project manager should be assigned to the initiative.

Step 2: Solicit bids and contract with an instructional design firm to assist with all aspects of developing the course. The firm should have experience with developing CTE courses, though experience in the transit industry is not necessary since SMEs will play this role.

Step 3: Determine the core knowledge-based competencies that should be the focus of the certificate program, specific learning outcomes tied to the competencies and the level of depth for each topic. Instructor and student guides can then be created. The SMEs can serve to provide guidance and review the materials.

Step 4: Once the instructor and student guides are in final form, the instructional design firm can develop assessment questions for issuing the credential, which will be kept in an item bank. While a psychometric analysis is not necessary for certificate programs, a passing point score process should be utilized to determine the cut score for earning the credential. One such process is the Angoff Method. The SMEs could complete the ratings required for this Method.

Step 5: The APTA project manager devises a Program Management Plan for all aspects of administering the certificate/credential. The Credentialing Consultant has provided APTA with a sample Program Management Plan that can be used by APTA for developing its own plan. Part of this will be selecting a vendor to administer the assessment and issue the certificates.

Step 6: Develop a marketing and promotion strategy to get the word out to APTA members about the “grow your own workforce” approach through the transit certificate program. The success of instituting the transit CTE course is going to depend on the partnerships between school districts and their local transit agencies. ACTE has several fact sheets on the impact of Career and Technical Education on building a quality, local workforce that can be distributed to APTA members to educate them on CTE. This would be a good place to start. Then, APTA can provide guidance to agencies on how to set up meetings with their local school districts, secure buy-in, etc. by publishing a handbook for member agencies.

Step 7: Evaluate the effectiveness of the new CTE program and credential. This is especially important since the transit industry is new to CTE and will want to determine the impact early on. The evaluation should address:

* How many transit agencies are pursuing local partnerships with their school districts to offer the transit course?
* How many students are selecting the course, completing the course and earning the credential?
* The quality of the course from the students’ and teachers’ perspectives:
  + Do students who earned the credential have a better understanding of the transit industry?
  + What percentage of the students who took the transit course is selecting transit career pathways?
* The quality of the course from a transit agency’s perspective:
  + Are the transit agencies seeing an increase in the number of young people applying for transit jobs?
  + Do agencies see a difference in how familiar with the transit industry young people are who earned the credential?

##### *Timeline*

Approximately one year would be needed for full implementation. This includes 6-9 months for APTA to develop the course, as well as time for APTA to prepare local agencies to partner with local schools to implement the CTE course.

#### Financials

Costs

APTA can utilize the content from its National Transit Curriculum, a semester-long college course in public transportation. It would need some content redevelopment to ensure it is appropriate for high school students, but should also keep some of its college-level rigor so that schools can potentially partner with their local community colleges to offer dual credit. It is also important that high-quality learning activities are integrated throughout, such as projects, group activities, career profiles, modular review activities and quizzes. The Credentialing Consultant provided a sample guide for a similar program in the energy industry to APTA. The number of instructional hours for a typical CTE course is about 130, which is important to state up front to instructional designers.

* Instructional Design: $125,000-$175,000, if using National Transit Curriculum and the reports and resources that are part of the curriculum for the base content. This would include all instructional design services in *the Steps to Implement This Option,* from competency development through providing print-ready instructor and student guides.
* Set up of an online system to administer assessments and issue the credential: This would include setting up an item bank of questions for the assessment, as well as the ability to process payments, administer the assessment and issue certificates to credential earners: $10,000-$15,000
* Honorarium for SMEs: SMEs typically earn a modest honorarium for their time. Though participating in the project would be considered part of their service to the industry, frequently SMEs do receive some type of compensation: $3,500-$5,000
* Development of a Handbook for APTA members to assist in their understanding of CTE, forming partnerships with local schools and utilizing credential earners as a local workforce pipeline: $3,500-$5,000

Total investment: $142,000-$200,000 plus related internal costs (APTA staff labor and G&A)

Potential Income

It is standard to charge a fee for individuals to take an assessment and be able to earn an industry-recognized credential. Given the audience is comprised of high school students and school systems have limited budgets, a suggested range for the assessment fee is $35-$50.

### Option #2: Develop a Transit Fundamentals e-learning course that results in an assessment-based certificate for employees who are new to the transit industry.

#### Why a Transit Fundamentals e-learning course?

A Transit Fundamentals course would enable new transit employees to develop a set of foundational competencies that deepen their understanding of the industry as a whole, and provide them with an opportunity to earn a credential. It could potentially provide another use for the National Transit Curriculum. By repackaging the curriculum for more than one purpose, APTA will be saving significant time and money and ensuring consistency with its credentialing products. While this option would not provide the same level of depth as the CTE course, it should provide enough detail to help new employees understand the industry and their roles within their agencies, while including sufficient rigor to attach a credential.

Benefits to APTA from developing a Transit Fundamentals course and credential:

* Provides the opportunity to move into the credentialing arena with very little risk.
* Offers a steady stream of income to the association, since there will be always be influx of new employees among member agencies. Fees could be collected for the course as well for the assessment/certificate.
* Builds on APTA’s reputation as a quality provider of workforce development offerings.
* By utilizing an e-learning format, saves APTA staff time compared to offering an in-person course.

Benefits to APTA member agencies:

* Saves agencies training dollars by alleviating the need to develop, implement and keep their own similar programs up to date, given the evolving state of the industry.
* Provides new employees with a broader perspective of the transit industry beyond any one agency’s footprint, strengthening the competencies of those new employees.
* Provides consistency in the development of competencies for employees new to the industry.
* By providing individuals the ability to earn an industry-recognized credential, it brings a high level of quality and rigor to the course.
* By using an e-learning format, transit agencies can save time and money, compared to having to send new employees to training locations.
* Employees will have flexibility as to when, where and how they earn the credential.

#### What would such a course and associated credential look like?

It will be important to ensure the Transit Fundamentals course provides a general overview of the transit industry that is applicable to the broad membership base of APTA. Certainly, some of this can be achieved by using the National Transit Curriculum. However, presenting individuals the opportunity to apply what they are learning to their specific agencies will be essential to the course being useful to new employees. By using an e-learning format and being creative in how to use the technology, this is achievable. The course could include a variety of personalized learning opportunities, such as reflection through online journaling; using employees’ specific agencies for case studies; or creating videos. Upon completion of the course, individuals would need to complete an assessment, achieving an established passing score, to be issued a certificate. Given the growth of digital credentials and badges, it is recommended that APTA issue both a pdf certificate as well as a digital credential/badge.

One of APTA’s other workforce development projects is centered on using e-learning. By developing and implementing Transit Fundamentals, APTA will also learn valuable lessons for the future. For example, it will be able to assess the membership’s appetite for e-learning, the most appropriate formats, etc.

In terms of determining an appropriate duration for the course, an e-learning program resulting in a credential should be long enough for individuals to gain a solid knowledge base and partake in quality personalized learning, but not so lengthy that it becomes daunting for members to complete. A fair estimate for an ideal time would be 16-20 hours.

#### Feedback on This Option

As with the transit CTE course, APTA’s Certification and Credentialing Advisory Group and APTA staff see this credentialing option as an excellent choice for APTA, stating many of the benefits detailed in this report. In addition, APTA Advisory Group member Corey Bixby, Board Member, Capital District Transportation Authority, specifically noted the opportunity to create “add-on” credentials to Transit Fundamentals that would have applicability to employees crossing a variety of roles. Since most transit employees don’t end up moving into management positions, they value the recognition they receive through certificates. Instituting topic-specific credentials that could be earned through e-learning and issued as certificates and/or badges would be an easily accessible and winning proposition to all. Security, transit auditing and resolving negative situations were some of the specific topics mentioned; however, additional research would be needed should APTA decide to go this direction down the road.

#### Steps to Implement This Option

Step 1: Form a small group (3-5) of transit SMEs who can serve as advisors for the design and development of the transit course. Typically, these would be volunteers of the association who have industry experience. They will most likely be in the Human Resources function and front-line managers, given the target audience for the credential is new hires. In addition, an APTA project manager should be assigned to the initiative.

Step 2: Solicit bids and contract with an instructional design firm to assist with all aspects of developing the course. The firm should have extensive e-learning expertise, though experience in the transit industry is not necessary since SMEs will play this role. Most likely, part of what will be required for the development of the e-learning course is the adoption of a learning management system (LMS), which is an area in which the instructional design firm can assist.

Step 3: Determine which core knowledge-based competencies to focus upon, specific learning outcomes tied to these competencies, and the level of depth for each topic.

Step 4: Develop the Transit Fundamentals e-learning course.

Step 5: If APTA chooses not to institute Option 1 (the CTE course), it will need to select a vendor to administer the assessment and issue the certificates. Given the size and scope of APTA’s potential e-learning certificate program, it is more economical to purchase this system separately than to a buy an LMS for which both the e-learning course is offered and which administers the course assessment and issues certificates. Fully loaded LMSs are costly and are designed for large e-learning and credentialing programs.

Step 6: The instructional design firm develops the assessment questions, with input and review by SMEs, to include in the item bank. As with the CTE course, a passing point score process should be utilized to come up with the cut score for the assessment.

Step 7: As with the CTE course, the APTA project manager would develop a Program Management Plan for all aspects of administering the certificate/credential. This plan would be similar to the CTE course since both are assessment-based certificates.

Step 8: Beta test the Transit Fundamentals e-learning course. It is recommended that APTA select a small group of transit agencies that can put some of their new employees through the course for the beta test. They should provide feedback on the content, quality of learning activities and ease of use. Conducting a beta test is important, given APTA is at the beginning stages of providing e-learning options to the membership.

Step 9: Revise the e-learning course, as needed.

Step 10: Develop a marketing and promotion strategy to get the word out to APTA members about the Transit Fundamentals course and credential and start implementation.

Step 11: Evaluate the effectiveness of instituting the new credential. Some recommended areas to address include:

1. Percentage of agencies that are integrating the credential into their onboarding programs
2. Ratings by credential earners on the value of the program in helping them adapt to the transit industry
3. How easily agencies are able to integrate the cost of the credential into their budgets

#### Timeline

The design and development of the e-learning course/assessment, including adopting an LMS, beta testing the course and having it ready to launch would take about 6-9 months. Another 2-3 months is needed to promote the course and start getting members registered. Full timeline: approximately 8-12 months.

#### Financials

Costs

Below is an estimated range of direct costs associated with this option:

* Development of e-learning course: This will depend on how many hours of learning are involved in the course and the e-learning approaches utilized, but a conservative range is about $100,000-$140,000 based on utilizing the National Transit Curriculum for content. This includes beta testing the course and development of assessment questions for the item bank.
* Learning Management System (just for the e-learning—does not include bullet below): Based on estimates APTA has received from the current e-learning initiative: $10,000-$25,000
* Set up of online system to administer assessment and issue the credential: This would include setting up an item bank of questions for the assessment as well as the ability to process payments, administer the assessment and issue certificates to credential earners: $10,000-$15,000 (may be less if using for both the Transit Fundamentals and the CTE assessment-based certificate programs)
* Honorarium for SMEs: SMEs typically earn a modest honorarium for their time. Though participating in the project would be considered part of their service to the industry, frequently SMEs do receive some type of compensation: $3,500-$5,000

Total investment: $123,500-$185,000 plus related internal costs (APTA staff labor and G&A)

### Option #3: Develop a Transit Cybersecurity course that results in an assessment-based certificate for transit managers, supervisors and CEOs.

#### Why a Cybersecurity Certificate program?

In today’s world, cybersecurity threats are real. Transit agencies are typically in a reactive mode, which can be costly, not only in dollars but also in terms of the reputational loss they can suffer. Now is the opportune time for APTA to take the leadership role in helping agencies create a culture of cybersecurity, just as the industry did with safety. A first step in this direction could be through the development of a cybersecurity training program for transit managers, supervisors and CEOs that would lead to a credential.

#### What would such a course and associated credential look like?

To maximize impact, this assessment-based certificate program would utilize a hybrid-learning approach. Interested managers, supervisors and CEOs would complete pre-work in advance of a one-day, in-person training program. This would include an internal cybersecurity assessment, along with pre-reading. Then, they would attend the training, offered either as a stand-alone course or in conjunction with another APTA meeting or conference, for approximately one day. Finally, they would go back to their agencies to continue with action planning started at the training and take an assessment available online. Upon completion of all requirements and earning a passing score on the assessment, individuals would earn the Transit Cybersecurity credential. Recommended topics include:

* National Security and Resilience Overview: Laws, Guidelines and Policies
* Assessment of Security Risks – Emerging Technology, Internet of Things (IOT), Industrial Equipment
  + Assessing information security risk in computing and network environments
  + Analyzing attacks on computing and network environments
  + Discovering software security vulnerabilities and applying patching and hardening methods
  + Securing devices, including physical security of devices
  + Using passwords for security
  + Identification of common end-user hazards
* Analyzing the cybersecurity threat landscape
  + Recognizing social engineering and insider threats
  + Browsing the web safely
  + Using email securely

#### Feedback on This Option

Since security was a topic mentioned specifically as a potential add-on credential to Transit Fundamentals, this option would most likely get positive feedback from the membership. Michael Echols, Executive Director and CEO, The International Association of Certified ISAOs, sees cybersecurity incidents and attacks presenting an emerging threat in this time of IT-OT convergence and the IOT age. He believes APTA should be the organization to lead the way in creating this credential as well as a cybersecurity culture in the transit industry.

#### Steps to Implement This Option

Step 1: Form a small group (3-5) of SMEs who can serve as advisors for the design and development of the cybersecurity course. This would include cybersecurity experts from business, APTA and the federal government, who can provide all the perspectives needed for this important topic. In addition, an APTA project manager should be assigned to the initiative.

Step 2: Solicit bids and contract with an instructional design firm to assist with all aspects of developing the course. This would include the pre-work, instructor guide and participant materials used for the in-person aspect of the course; the action planning tool; and the online assessment required for individuals to earn the certificate/credential.

Step 3: Determine which core knowledge-based competencies to focus upon, specific learning outcomes tied to these competencies and the level of depth for each topic.

Step 4: Develop the Cybersecurity Certificate pre-work, instructor and participant materials and action planning tool.

Step 5: If APTA chooses not to institute either of the first two assessment-based certificate program options, both of which include having participants take assessments to earn the associated credentials, APTA will need to go through the process at this time to select a vendor for this role.

Step 6: The instructional design firm develops the assessment questions, with input and review by SMEs, to include in the item bank. A passing point score process should be utilized to come up with the cut score for the assessment.

Step 7: As with the other assessment-based certificate program options, the APTA project manager would develop a program management plan for all aspects of administering the certificate/credential.

Step 8: Develop a marketing and promotion strategy to get the word out to APTA members about the Transit Cybersecurity course and credential and start implementation.

Step 9: Evaluate the effectiveness of instituting the new credential. Some recommended areas to address include:

1. Ratings by credential earners on the value of the program in helping them understand cybersecurity risks and how to address them
2. Confidence level of transit managers, supervisors and CEOs that their agencies are less vulnerable to cybersecurity risks than before earning the credential
3. How easily agencies are able to integrate the cost of the credential into their budgets

#### Timeline

The design and development of the hybrid learning course/assessment would take about 4-6 months. Another 2-3 months would be needed to promote the course and to start getting members registered. Full timeline: approximately 6-9 months.

#### Financials

Costs

Below is an estimated range of direct costs associated with this option:

* Instructional Design: $40,000-$50,000
* Set up of an online system to administer assessment and issue the credential: This would include setting up an item bank of questions for the assessment, as well as the ability to process payments, administer the assessment and issue certificates to credential earners: $10,000-$15,000
* Honorarium for SMEs who typically earn a modest honorarium for their time. Though participating in the project would be considered part of their service to the industry, frequently SMEs do receive some type of compensation: $3,500-$5,000

Total investment: $53,500-$70,000 plus related internal costs (APTA staff labor and G&A)

## Potential Income for Assessment-based Certificate Programs

The amount of income will vary depending on the number of members who register for the courses and take the assessment. Below is a sampling of how much several members of the National Network of Business & Industry Associations (NNBIA) charge for their certificate programs and associated credentials. This includes both in-person and e-learning options.

|  |  |  |  |
| --- | --- | --- | --- |
| Organization | Name of Certificate Program | Exam/certificate fee | # of hours to complete certificate program |
| * [National Apartment Association Education Institute](http://www.naahq.org/learn/education/naa-education-institute) | Certified Apartment Manager  Credential for Green Property Management | Online course fee $825  Fee is determined by training providers; no assessment | 40 hours  16 hours of training then 4 hours of continuing education |
| [National Retail Federation Foundation](https://nrf.com/who-we-are/nrf-foundation) | Retail Industry Fundamentals  Customer Service and Sales | For both online and instructor-led; $50 includes test voucher; $50 to retake exam  Instructor-led only; learner guide $65; test fee $45 | Instructor-led 20-40 hours; online 10 hours    20-40 hours |
| * [Interstate Renewable Energy Council](http://www.irecusa.org/) | Certificate of Apartment Maintenance Tech + Energy. (Micro-credential) CAMT+E. Need to earn CAMT credential first. | Online only for members only $199 | 2 hours |

## Certification Programs

Starting a new certification program is a big move for an association. One of the most important first steps for the organization is to understand what a certification is and what it is not. APTA and APTA’s Certification and Credentialing Advisory Group’s participation in the Virtual Credentialing Workshop provided a foundation for both groups.

Some advantages to APTA in considering certification include the changing nature of the transit industry, especially as it relates to the certification option presented in this report; enhancing APTA’s image and credibility; providing a new service to the transit world; and enabling transit employers to identify qualified employees. Should APTA decide to go the certification route, it could benefit from this excellent set of resources: *The Business of Certification: Creating and Sustaining a Successful Program, 2nd Edition* and *The Certification and Accreditation Law Handbook (2016)*. Both are available from the American Society of Association Executives.

Some highlights from *The Business of Certification: Creating and Sustaining a Successful Program, 2nd Edition* worth noting as APTA explores certification include:[[5]](#footnote-5)

* Certifications are a high-stakes business, and with them, come legal issues and risks. Risks can come from:

(a) setting requirements that unfairly exclude otherwise qualified candidates;

(b) using eligibility requirements and assessment processes that are unfair and/or lack psychometric soundness;

(c) missing appropriate policies and procedures, including those related to appeals and disciplinary actions; and

(d) failing to consistently follow documented policies and procedures.

* Associations assume that academics and trainers know how to write test questions and create examinations. However, these SMEs typically are not familiar with the specialized processes to develop and maintain certification examination, or the many other elements necessary for a high-quality professional credentialing program.
* Successful development and maintenance of a certification require substantial investment of personnel resources, including association staff, volunteers and consultants (legal, psychometric, technological, financial, etc.), as well as careful coordination and management of these resources.

### *Certification Option*

### Option #4: Launch a mobility management certification program that includes two levels, one for mid-level and the other for senior-level professionals.

As transit providers transition from fixed-route service operators toward collaboration with other transportation providers, the role of mobility managers and other related professionals continues to grow. In 2016, the National Center for Mobility Management (NCMM), a national technical assistance center operated through a consortium of APTA, the Community Transportation Association of America, and the Easterseals Transportation Group, published *Competencies for the Practice of Mobility Management*. The competencies outline the knowledge, skills and expertise for the growing field of mobility management. The goals of this initiative were to:

* Develop mobility management competencies that are valid with the current thinking and will serve as broad guiding principles for the field;
* Develop specific competencies for the various types of mobility managers, programs and systems;
* Focus on building capacities for the potential use of mobility management competencies on local, statewide and national levels; and
* Include and encourage the voices and input of a diverse range of mobility managers across various types of industries, including but not limited to transit, workforce, medical, veteran and human service industries.

A possible next step for APTA and its NCMM partners would be to utilize the mobility management competencies as a starting point for developing a mobility management certification program. This would add a level of rigor and professionalism to the emerging field of mobility management. If there is any time to institute certifications in this field, now is the opportunity to get ahead of the curve. Given that a set of competencies exists, this would make the process for developing and implementing the certification program less intensive than a brand-new certification. Through the expertise of a firm specializing in certifications, NCMM would be able to take the competencies and refine them as part of the Job Task Analysis.

Ideally, the mobility management certification program would support two occupations: one for Mobility Managers, and a more senior, strategic level for Innovation Officers. While the specifics of the certifications would need to be determined as part of the certification development process, they might include areas such as:

* Mobility Managers:
  + Conduct environmental scans of mobility services to identify service characteristics including accessibility features, implementation costs and efficacy data;
  + Collect mobility needs assessment information from individuals and community organizations;
  + Identify a range of mobility solutions to align with the needs of diverse individuals;
  + Collaborate with human services and transit professionals and organizations to generate new mobility services;
  + Develop performance metrics and data collection protocols to assess the efficacy and quality of mobility solutions;
  + Communicate information about mobility options to diverse audiences; and
  + Procure funding and in-kind support related to the development of mobility service continuums.
* Innovation Officers:
  + Use data, including needs assessment information, to identify accessible mobility solutions within and outside of an organization/agency;
  + Ensure that new mobility solutions align with the capacity, strategic plans and governance structures of an organization/agency;
  + Understand Federal and state regulatory requirements regarding transit service and operations;
  + Develop performance measurement plans and protocols that integrate overall organization/agency performance systems; and
  + Communicate content about mobility solutions to internal and external stakeholders, including Boards, agency leaders, staff, state officials and the general public.

##### *Feedback on This Option*

Even though certifications are more involved and pose some legal risks over assessment-based certificates, APTA’s Certification and Credentialing Advisory Group, APTA staff and NCMM support the mobility management certification option. The transit industry is evolving, and so must the roles of those involved in mobility management. As stated by Judy L. Shanley, Ph.D. Easterseals & Co-Director of the National Center for Mobility Management: “The world of mobility and transportation is quickly changing, demanding a renewed set of competencies for individuals who work in our industry. A professional with a Mobility Management Certification would provide the field with increased assurance that an individual has the knowledge, skills and experience to be effective as a mobility innovator in a dynamic setting.”

##### *Steps to Starting a New Certification Program*

Step 1: From the start, it is important to have a separate governing oversight body for the certification program, often called a Certification Body or Certification Board. This Body/Board must be administratively and fiscally separate from APTA or NCMM. This is to avoid the appearance of a conflict of interest or restraint of trade. The oversight body oversees the governance and operation of the certification program. This is where the ASAE publication, *Certification and Accreditation Law (2016),* can come in handy, since it outlines the responsibilities of the oversight body.

Step 2: Engage the Certification Body/Board, ATPA Workforce Development staff and the NCMM partners in a strategic planning session for the certification program. The strategic plan, just like a strategic plan the association has for its overarching role for the transit industry, would include a mission; a Strengths-Weaknesses-Opportunities-Threats (SWOT) analysis; goals and tactics; and performance indicators. This could be done through APTA’s existing internal resources or vendors, but the focus would be specifically around the new certification program. Therefore, it may make sense to outsource the facilitation of this process.

Step 3: Seek bids, then institute the expertise of a firm that specializes in certifications to assist with the development of a certification business plan. Given that APTA and/or NCMM would be a new certification issuer, it is recommended this approach be utilized rather than trying to do this independently. The business plan would include coming up with eligibility requisites and recertification requirements; estimated revenue and expenses; policies and procedures; and a comprehensive marketing plan.

Step 4: Seek bids, then work with a firm (could be the same as in Step 3) to conduct a Job Task Analysis. A Job Task Analysis (JTA) is a formal process for determining or verifying what individuals do, under what working conditions they do it, what they must know, and the skills they must have for a specific occupation. It is important to utilize this method as part a certification program, either partially or in full. For the mobility management certification program, the competencies that have already been developed can be a starting point, so a full JTA may not be necessary.

Step 5: Seek bids, then work with a firm (could be the same as Step 3 and/or 4) to develop the certification exam. This process will involve SMEs from the transit industry, as well as certification professionals with psychometric expertise.

Step 6: Implement the certification marketing strategy.

##### *Timeline*

It is estimated that it would take approximately one year to institute a new certification program.

##### *Financials*

Costs

* Strategic/Business Planning: $30,000-$50,000
* Job Task Analysis: $40,000-$100,000
* Certification Exam Development: $60,000-$100,000

Total investment: $130,000-$250,000 plus related internal costs (APTA staff labor and G&A)

##### *Potential Income*

The cost for the certification will be determined during the business planning stage, but to provide context, here are some fees that other members of the National Network of the Business & Industry Associations and the American Society for Association Executives charge for their certifications:

|  |  |  |  |
| --- | --- | --- | --- |
| Organization | Name of Certification | Exam/Certification Fee | Re-certification Fee |
| * [American Hotel & Lodging Association](https://www.ahlei.org/) | Certified Hotel Administrator  Certified Hospitality Revenue Manager | $525 member, $700 non-member; Retakes $100 per section, up to two sections  $300 member, $375 non-member | $100  $200 |
| * [APICS](http://www.apics.org/) | 1. Certified in Production and Inventory Management 2. Certified Supply Chain Professional 3. Supply Chain Operations Reference Professional 4. Certified in Logistics, Transportation and Distribution | Program material for #2 $1,250; Exam registration $695 members, $965 non-members;  Retakes $450 | $75 for members,  $150 for non-members |
| * American Society for Association Executives (ASAE) | Certified Association Executive | Application fee (includes exam) $500 for member, $750 for nonmember | $350 for members,  $500 for nonmembers |

## Soliciting Industry Feedback

While APTA leadership considers the credentialing options presented in this report, it will be important to solicit industry input before making any final decisions or committing resources to moving forward. Many industry associations have made the mistake of believing that if they “build it, they will come.” No matter how worthy new credentials might seem, if the APTA membership and other stakeholders are not committed to investing the time, money and resources needed for their current and future workforce to earn any of these credentials, none of the options will be successful. It is recommended that APTA utilize both focus groups and surveys. The next section includes suggested questions for utilizing both formats.

### *Focus Groups*

Focus groups are a way to gather qualitative data around credentials from the membership. These can be done via conference call or scheduled during in-person events, such as conferences. It is ideal to handpick small groups (5-8) of active, engaged members. Focus groups can target one specific credential or several under consideration. However, separating certificate programs from certifications will generate more impactful information.

Some key areas to cover during the focus groups:

* Explain the type of credential you are going to be discussing using information presented at the Virtual Credentialing Workshop. Most people don’t know that certificates and certifications are different or that certificate programs can be assessment-based.
* Discover which credentials focus group members hold, if any, and if they are required or preferred. How did they earn the credentials? How have they provided value to them and to their transit employers?
* Ask if they see APTA as being an important player in the credentialing arena. Why or why not?
* For potential credential earners: What would motivate them to pursue the credential being presented? What do they perceive as benefits of that credential? What barriers do they foresee, if any, in earning that credential? Are there any existing credentials they are aware of that might be competing with this credential?
* For transit decision-makers/managers: Ask which of their employees would most likely be candidates for earning the credential being presented. What would be the benefits to those employees of earning the credential? What are the benefits to the employers/managers of those individuals? Are there any barriers they perceive in having their employees earn the credential? If yes, what are they? What could APTA do to address those issues (if applicable)?
* Special questions for the CTE focus group: Ask where member agencies currently recruit from when hiring their entry-level workforce, specifically the next generation of transit workers? How do they learn about the transit industry? Do their agencies support local schools as a potential pool for entry-level workers and if so, how? What do they think about a high school CTE course that would enable students to earn a credential issued by APTA to demonstrate their foundational knowledge of the transit industry? What are some ways they might support/partner with the schools if this were the case?

### *Surveys: Assessment-based Certificate Programs*

APTA can utilize Survey Monkey or another inexpensive survey tool to administer online surveys. While distributing the survey to a large enough group is needed to assure validity, it is not recommended that APTA send an online survey to the entire membership. Instead, target specific transit agencies that represent the breadth of APTA’s membership, selecting those who are in decision-making roles and are potential credential earners to yield the best results. Below are suggestions for survey questions for the assessment-based certificate program options.

* CTE Course: More impactful to solicit feedback through a targeted virtual focus group
* Transit Fundamentals: A survey using the overview and questions detailed below

APTA is considering the development of a Transit Fundamentals e-learning course to provide new transit employees with a set of foundational competencies; to help them understand the industry as a whole; and to provide them with the opportunity to earn a certificate upon completion of the program and earning a passing score on a final assessment. The course would cover topics such as the history of public transportation; the organizational structure and governance of public transportation agencies; and public transit trends and evolving technology, including mobility management. APTA would like your feedback on the possibility of instituting this new transit credential for the membership.

Number of employees in your transit agency. (Select/Add Ranges)

How would you rate the value of such a certificate for new employees at your agency? (Select/Very valuable, Somewhat Valuable, Not Valuable, Don’t Know)

How many new employees per year would be eligible to earn the certificate? (Select/Ranges)

How likely would you be to require or encourage new employees to earn the credential? (Select/Very Likely, Somewhat Likely, Not Likely, Don’t Know)

What would motivate employees to earn the certificate? (Open-ended response)

What would be some obstacles to employees earning the certificate? (Open-ended response)

What pricing range would your agency be willing to pay for each employee to take the e-learning course as well as take the assessment to earn the credential? (Select/Ranges)

* Transit Cybersecurity: A survey using the following overview and questions to send to CEOs

APTA is considering the development of a Transit Cybersecurity course for agency managers, supervisors and CEOs to address ongoing cybersecurity threats in public transportation. This new program would enable those in management positions to earn a credential upon completing the program requirements. The course would cover topics such as assessing security risks, emerging technologies and identification of common end-user hazards. APTA would like your feedback on the possibility of instituting this new transit credential for the membership.

Number of employees in your transit agency. (Select/Add Ranges)

How would you rate the value of such a certificate being available to yourself and/or managers and supervisors at your agency? (Select/Very Valuable, Somewhat Valuable, Not Valuable, Don’t Know)

How many new employees per year would be eligible to earn the certificate? (Select/Ranges)

How likely would you be to require or encourage managers and supervisors to earn the credential? (Select/Very Likely, Somewhat Likely, Not Likely, Don’t Know)

What would motivate managers and supervisors to earn the certificate? (Open-ended response)

What would be some obstacles to employees earning the certificate? (Open-ended response)

What pricing range would your agency be willing to pay for each manager or supervisor to take the Cybersecurity course as well as take the assessment to earn the credential? (Select/Ranges)

### *Survey: Certification*

* Mobility Management: A survey using the following overview and questions

As transit providers transition from fixed-route service operators toward collaboration with other transportation providers, the role of mobility managers and other related personnel continues to grow. APTA, as part of the National Center of Mobility Management (NCMM), is considering a new certification program in mobility management to assist those involved in the evolving field with developing their competencies and gaining recognition for their achievements. While the specifics are still under consideration, this certification would have two levels: one for Mobility Managers and one for Innovation Officers. APTA and NCMM would value your feedback on the possibility of this exciting new certification program.

Number of employees in your transit agency (Select/Ranges)

How would you rate the value of these certifications being available to those who focus on mobility management at your agency? (Select/Very Valuable, Somewhat Valuable, Not Valuable, Don’t Know)

How many employees might be eligible to earn the Mobility Managers certification? (Select/Ranges)

How many employees might be eligible to earn the Innovation Officers certification? (Select/Ranges)

How likely would you be to require or encourage any of your employees to earn the Mobility Managers certification? (Select/Very Likely, Somewhat Likely, Not Likely, Don’t Know)

What would motivate employees to earn the Innovation Officers certification? (Open-ended response)

What would motivate employees to earn one of the certifications? (Open-ended response)

What would be some obstacles to employees earning either of the certifications? (Open-ended response)

What pricing range would your agency be willing to pay for certification? (Select/Ranges)

## Conclusion

APTA has four strong credentialing options to consider, all of which have overwhelming support from APTA’s Certification and Credentialing Advisory Group and APTA staff. Even though each will require upfront investment and time, they all have potential to transform the transit industry, by both building a pipeline of talented workers and improving the knowledge and skills of those already in the industry. Addressing both audiences is essential as the transit industry goes through significant transformation. As stated by Richard W. Andreski, Bureau Chief, Public Transportation, Connecticut Department of Transportation, who reviewed the report: “The public transportation industry is changing quickly with new technologies and a generational shift in the workforce. The proposed credentialing program is essential to elevating the quality of our workforce and preparing for the many opportunities ahead.”

The first option of a high school-level, transit-focused CTE course and credential is one that many leading industries are using for both career awareness and to help prepare the future workforce. There are impressive statistics to support the success of this strategy. The second option, a Transit Fundamentals e-learning course and credential, would enable employees new to the transit world to build foundational competencies to help them better understand the industry, making them more effective employees. The Cybersecurity program for managers, supervisors and CEOs – the third assessment-based certificate option – comes at an important time, as agencies are coping with real threats and security breaches and are in need of strong leadership. The final option, the mobility management certification program, would take an emerging profession and add rigor and professionalism as transit agencies move from fixed-route service operators toward a strategic, collaborative approach of synchronizing mobility services.

It is recommended that once APTA leadership considers the options and decides which one(s) fit best with APTA’s workforce development mission, they spend time in a dialog with the membership and related organizations. Research and the experience of other associations that have taken the step of becoming credentialing providers only find success when there is strong membership and stakeholder support. The focus group and survey materials included in the report can help to get these discussions started. In addition, APTA leadership can share the credentialing options with transit industry stakeholders, such as NCCM, NTI, the Transportation Learning Center and others. By coming together as an industry, public transportation can ensure it has the best and brightest skilled workforce, as APTA’s 2017-2018 Chair, Nathaniel P. Ford Sr., has envisioned.

## APPENDIX A: Certification and Credentialing Advisory Group

|  |  |
| --- | --- |
| **Mr. Corey Bixby** | Board Member, Capital District Transportation Authority |
| **Mr. Lester Bryant** | [Principal, LWBSolutions](https://www.aptagateway.com/eweb/DynamicPage.aspx?Webcode=APTAOrgDetailBasic&org_cst_key=4c1b0898-52dc-465a-bf1b-f53e84e34b42) |
| **Mr. Michael Echols** | Executive Director and CEO, The International Association of Certified ISAOs |
| **Ms. Geisha Ester** | Director, Training and Professional Development, Chicago Transit Authority |
| **Dr. Barbara Gannon** | Principal, GannonConsult |
| **Mr. Paul Larrousse** | Chair, APTA Workforce Development Committee, Director, National Transit Institute Rutgers, The State University of New Jersey |
| **Ms. Stephanie Laubenstein** | Business Segment Director, New Flyer of America |
| **Ms. Adelee Le Grand, AICP** | Chief Strategy Officer, Vice President, Transdev, Regional Transit Authority |
| **Mr. Mike Loehr, P.E.** | Global Practice Leader, Transit & Rail, Track & Civil, Jacobs |
| **Ms. Bacarra Mauldin** | Workforce Development Champion, Board Member, Birmingham Regional Paratransit Consortium dba ClasTran |
| **Ms. Shelly Weir** | Senior Vice President of Career Development, American Hotel & Lodging Educational Foundation |

## APPENDIX B: Input from APTA Staff

As part of the research phase of devising credentialing options, input from key APTA staff members was solicited. The purpose of these meetings and subsequent follow-up was to determine the existing credentials within their areas of expertise, specifically industry-recognized certifications, certificates and badges, and establish if there might be any opportunities to form new partnerships with the credentialing issuers for transit-specific credentials or if there were any gaps where APTA might play the role of credential developer and issuer. Each staff member was asked:

* What certifications, certificates or badges do APTA members work to obtain in their discipline areas?
* Are these required or optional? Are they used for advancing in the discipline?
* Who are the providers of these recognitions?
* Are there gaps that exist in your area of expertise where APTA might develop a new credential for the industry?
* What might be new areas to explore given the current disruptions in the transit industry?

*Mary Childress, CFO/Vice President Finance and Administration*

Those who oversee a transit agency’s finances and administration, depending on their area(s) of expertise, earn a variety of credentials, such as IT certificates/certifications or Society for Human Resource Management (SHRM) designations. They also must have intricate knowledge of government accounting procedures and may possess related accounting certifications. There is potential for a transit procurement certification since standards have been developed around this topic, which could be a launching point for developing a certification for individuals who oversee this function.

*Jack Gonzalez, Senior Director, Marketing & Sales*

The responsibilities for employees in the marketing and communications function within transit agencies vary. They can include areas such as press, social media, customer service and community outreach, among others. Though national organizations, such as the American Marketing Association, the Public Relations Society of America and the International Association of Business Communicators issue credentials, it is not common for transit employees to have those designations. While there is potential for creating transit-specific credentials within one or more of the marketing and communications functions, the APTA Marketing and Communications Committee does not see this as a compelling need, though it could be an incentive for those who are new to the industry to stay in the industry.

*Polly Hanson, Director, Security, Risk and Emergency Management* and *Brian Alberts, Director of Safety*

Depending on the level of the position, transit police receive their training and credentials through advanced degree programs or organizations that specialize in policing, such as the Police Executive Research Forum, the International Association of Chiefs of Police or through state or regional police training academies. While it may be beneficial to consider a transit-focused training program resulting in a credential such as a certificate, there are a small number of agencies that have dedicated security directors or police chiefs. There are other areas that impact a greater number of members, such as security, transit auditing or sexual harassment that might be considered as “add-on” credentials to the Transit Fundamentals e-learning certificate program. In addition, a Cybersecurity certificate program option is included in the credentialing options, which would be focused on managers, supervisors and CEOs.

*Beverly Hill, Senior Program Manager (Procurement)*

Transit employees who work in finance and accounting have a variety of certifications that are essential for their areas of practice. For example, they can be Certified Public Accountants or Certified Internal Auditors. APTA provides CEUs through its educational programs and conferences for many of these certifications. Given the importance of the certifications in this area that crosses industries, APTA members have not expressed a need for transit-specific certifications, including procurement.

*Charles Joseph, Director, Rail Services*

On-the-job training is the norm on the rail side, so there are very few credentials issued by outside organizations. There are a handful of community/technical college partnerships where the college provides training, but these tend to be courses, not certificate or degree programs. A more common model is apprenticeships. At this time, there are six partnering transit agencies who have formed a consortium and are developing an apprenticeship model where standardized elevator and escalator training is provided through the Transportation Learning Center. The consortium and the Transportation Learning Center are considering a similar model around signaling. For those who are in rail operations and have supervisory responsibilities, an instructor-led course is under development by an industry consultant.

*Eugene Reed, Program Manager, APTA Standards Support* and *Jeff Hiott, Assistant Vice President of Technical Services and Innovation*

APTA standards provide high quality, voluntary standards for transit agencies. However, it was determined that there were none that would lend themselves to translation to credentials.

*Zach Smith, Program Manager, Policy and Planning*

Transit planning employees typically earn their Urban Designer or Transportation Planner specialty certifications through the American Institute of Certified Planners (AICP) early on in their careers, since the certification requires both education and on-the-job experience. The Transportation Planner certification does include some transit-focused competencies. Planning employees may also earn a variety of certifications through the American Institute of Architects.

*Rich Weaver, Co-Director, National Center for Mobility Management*

The field of mobility management is evolving. The National Center for Mobility Management developed a set of competencies for the practice in 2016. These competencies could potentially serve as a starting point for developing certifications for the transit industry. It would be ideal to have two levels of certifications: one for Mobility Managers and a second, more advanced certification, for Innovation Officers. This could be an effort in partnership with Easter Seals and the Community Transportation Association, with the credentials issued by the National Center for Mobility Management. Now would be the ideal time to develop and institute the two certifications, as the transit industry is on the cusp of transformation.

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