







The Honorable Larry Hogan, Governor The Honorable Delores Kelley, Chair, Senate Finance Committee The Honorable Dereck Davis, Chair, House Economic Matters Committee

Re: MSAR 9963

Dear Governor Hogan and Chairs Kelley and Davis:

2020 has been a difficult year for many Marylanders. The catastrophic impacts of the COVID-19 pandemic and its far-reaching ramifications on the health, well-being, and economic state of Maryland residents and businesses will be felt for many years to come. However, in the pages of this report, you will see hope for a better future as we continue to recover from this unprecedented era in our history.

I am pleased to present you with the 2020 annual report for the Employment Advancement Right Now (EARN) Maryland program. This nationally-recognized program has placed more than 5,400 unemployed and underemployed individuals into employment, and provided critical upskilling opportunities for nearly 8,600 incumbent workers. While not without challenge, our partners by and large were able to successfully shift to virtual learning and provide continuity of services to their clients, which became of paramount importance in the middle of a pandemic.

As you and your colleagues make difficult budgetary decisions, I am pleased to report that the EARN program continues to be a sound investment for Maryland. In a recent study on the economic impact of EARN, the Business Economic and Community Outreach Network (BEACON) at Salisbury University found that for every dollar the state invests into the program, an additional \$17.32 in economic activity is created. The national average for programs similar to EARN is \$3.41.

In the coming months, and even years, as Maryland businesses continue to recover from the financial ramifications of COVID-19, programs like EARN Maryland will be critical. It is through the work of our EARN partners that employers will have the skilled workforce necessary to grow, strengthen, and recover from this extraordinary crisis.

I am extremely proud of our partners who have displayed resilience in these trying circumstances, and I look forward to the day that I am able to, again, see their work in action.

Best Regards,

Tiffany Robinson

Tiffen P. Robin

Secretary

As COVID-19 began to impact Maryland, countless companies shifted operations to help fight the virus and slow the spread. Below is a story of how one EARN partnership was able to help a company pivot operations to hire individuals who found themselves unemployed due to the virus and ultimately provide Personal Protective Equipment for Maryland teachers.

When the pandemic struck, Hardwire LLC, a manufacturer in Pocomoke City, joined the fight against COVID-19 by retooling one of its manufacturing facilities to produce high-quality, reusable face shields. In order to meet this demand, Hardwire needed to hire and train new employees. EARN grantee, the Maryland Manufacturing Extension Partnership (MEP), was critical in supporting Hardwire in this endeavor. MEP provided support for the newly hired employees, training these individuals on manufacturing assembly, packaging operations, and how to safely operate large Computer Numerical Control cutting equipment.

"Without the support of MD MEP and the EARN program, Hardwire would not have been able to train these workers on manufacturing and production techniques in such a quick manner," said Mike Kelleher, Executive Director of the Maryland MEP. "The flexibility of the EARN funding to be adapted to meet the needs of the company made it possible to train a lot of inexperienced production workers in a very short timeframe."

"Participation in the EARN training program enabled our team to efficiently and quickly train a large number of new employees for a critical project to manufacture personal protective equipment in support of the fight against COVID-19," said Emily Tunis, COO of Hardwire "Training such a large number of new employees to safely join a manufacturing operation and produce high quality medical-grade products is not an easy task. The EARN program's support was a game changer in our ability to expand manufacturing operations and impart the critical knowledge need for our project."

On November 16, 2020, Hardwire donated 200,000 face shields to the Maryland State Department of Education. Of the donation, Governor Hogan said, "This donation of face shields from Hardwire will help Maryland further boost our critical stockpile and prepare our state to face this surge of COVID-19."



The Governor accepted the donation of Hardwire face shields at Annapolis High School, where he was joined by Hardwire CEO George Tunis, State Superintendent of Schools Dr. Karen Salmon and Hardwire President and Chief Operating Officer Emily Tunis.

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Maryland's Nationally-Recognized Workforce Solution

Employment Advancement Right Now (EARN) Maryland is the State's nationally recognized workforce solution.

EARN is industry-led, designed with the flexibility to ensure that Maryland's businesses have the talent they need to compete and grow. The success of the program is seeded in collaboration among a diverse group of partners, including employer and industry partners, non-profit and community-based organizations, and workforce, economic development, and education partners. Based upon employer-identified training needs, Strategic Industry Partnerships (SIPs) provide education and skills training to unemployed and underemployed Marylanders, including support for individuals with specific barriers to employment. EARN also provides career advancement strategies for incumbent workers.

Recognizing that a workforce system disconnected from business fails to meet the needs of jobseekers, EARN's innovative model tasks businesses and workforce intermediaries with the identification of workforce needs and skills gaps and the development and design of curriculum and training programs. Their role in the process breeds confidence that program participants possess the relevant skills that will allow them to be contributing employees who will help improve their business.

Since the program began in 2014, EARN has been recognized as a best practice by numerous organizations, including the National Skills Coalition and the Urban Institute for its unique program design and work in implementing sector strategies. EARN was named one of the Top 25 programs in the 2018 Innovations in American Government Award competition by The Ash Center for Democratic Governance and Innovation, a leading research center at the John F. Kennedy School of Government at Harvard University. The program highlights exemplary models of government innovation and advances efforts to address the nation's most pressing public concerns. Most recently, EARN was cited in a *report* published by the *National Skills Coalition* for its investment into incumbent worker training. Furthermore,

EARN staff have provided technical assistance to other states and localities looking to implement similar initiatives, most recently for the City of Birmingham, Alabama.

In response to employer demand, the program continues to focus primarily on two distinct subsets of the workforce: unemployed/underemployed and incumbent workers. Employers identify incumbent worker training as an indispensable tool that is critical for growth, retention, and increased competitiveness. However, many companies have to forgo these training opportunities due to costs. EARN provides these critical opportunities at little-to-no cost for employer partners. As of October 2020, more than 8,500 incumbent workers have received training, attaining new credentials, certifications, and/or skills that lead to improved productivity, cost savings, wages, and job retention.

Additionally, employers across the state, regardless of industry, identify challenges around recruitment, especially for entry-level positions. Thus, EARN SIPs seek to grow the pipeline of qualified workers with the appropriate skillsets who are ready and able to work. As of October 2020, more than 5,300 individuals have obtained employment through EARN. As a result of their participation in EARN, employers have a steady pipeline of candidates with relevant skills to consider for hire, thus decreasing screening, interviewing, and training costs while reducing worker turnover.



PROMISING PRACTICES

Pivoting in a Pandemic

In response to Governor Hogan's stay-at-home order issued in March, EARN grantees quickly worked to determine how best to continue to serve their participants. Continuity of service was of utmost importance as many participants have multiple barriers to employment and receiving support during this unprecedented time was critical for continued engagement. In the immediate, many grantees were able to provide support services and case management virtually.

Over time, many grantees were able to transition to remote learning. While not without challenge, this shift in service



delivery has opened up an entirely new method for providing training, creating tremendous flexibility for participants, and maximizing access to training. For instance, remote learning removes any barriers that transportation or childcare might present for participants. Additionally, grantees now have the capability to provide training to individuals outside of the typical geographic region that they typically serve, resulting in an increase in interested applicants.

That being said, some grantees were unable to shift to virtual learning. Some programs require hands-on training that is only possible in-person. For instance, training someone to be a welder requires hands-on training in a welding booth. Grantees that were unable to shift to remote learning put training on hold until it was possible to meet in person. Generally, grantees have been able to resume training, either remotely, or in-person, following the Center for Disease Control guidelines for social distancing.

Responding to Changing Training Needs within Industry

Healthcare

In order to fight COVID-19, healthcare employers scrambled to find a pipeline of qualified individuals to care for the surge of patients. This made the work of the healthcare EARN partnerships vitally important as the need for all frontline positions skyrocketed. Additionally, a need for contact tracers developed. This was a key to slowing the spread of COVID-19.

The Baltimore Healthcare Partnership, led by the Baltimore Alliance for Careers in Healthcare, quickly developed and implemented Contact Tracer training. The Asian American Center of Frederick also provided Contact Tracer training. Additionally, two graduates of the Asian American Center of Frederick program are currently working at COVID-19 testing sites seven days a week.



Supporting and developing new nurses is a critical effort in normal circumstances, but it is even more critical in the height of a pandemic. The Specialized Nursing Bridge Program, led by Adventist Healthcare, seeks to provide additional support for first-year nurses to lower the attrition rate. As the pressure and stress due to COVID-19 was heightened, this training was essential in ensuring newer nurses felt supported and had the coping strategies to maintain employment. In 2020, this partnership launched its largest cohort since beginning the program.

Specialized Nursing Bridge Program nurse cohort diligently working to help fight the spread of COVID-19.



Early in the pandemic, it became apparent that the need for Personal Protective Equipment (PPE) was going to skyrocket. In order to meet this demand, the Maryland Manufacturing Extension Partnership (MEP) was able to support manufacturers in real time as they quickly pivoted production and brought on new staff to manufacture face shields and masks. The partnership was able to provide support to multiple companies. Of note, MEP partnered with Hardwire to train more than 150 new hires to safely and effectively manufacture high-quality, medical-grade products. Hardwire, in turn, donated 200,000 face shields to the Maryland State Department of Education.

BioTechnology

In order to flatten the curve and stop the spread of COVID-19, biopharmaceutical companies worked diligently to create vaccines, antiviral medications, and therapeutic treatments. This provided an excellent opportunity for graduates from EARN BioTech programs to learn firsthand and be a part of something truly groundbreaking. The Baltimore BioTechnology SIP, led by Baltimore BioWorks, placed three graduates at Global Botanical Manufacturing, a local biotechnology company. The company is currently manufacturing a therapeutic treatment that reduces the COVID-19 viral load so that an infected person does not

get sick or exhibit symptoms. Baltimore BioPrep, led by the BioTechnical Institute of Maryland (BTI), reported that many of their recent graduates were hired by biotechnology companies in biomanufacturing positions working on the production of COVID-19 detection and therapeutics to fight the virus.

Hospitality

industry.

Strategic Industry Partnership BioTrain participates in a Career Fair with employer

partner AstraZeneca to share information

with Marylanders about the biotechnology

The economic disruption caused by the pandemic has been devastating for communities and families. The Maryland Food Bank (MFB), an EARN grantee, has played a vital role in providing nutritious meals to the growing number of food-insecure Marylanders during this heightened time of need. As part of their COVID-19 Food Access Response Plan, MFB distributed boxed meals, which were prepared by their EARN culinary trainees in the food bank's Charles T. Bauer Community Kitchen. Between March and September, the MFB, with the help of EARN trainees, prepared and delivered 401,540 meals.

Diversifying the Information Technology Workforce

Data show that women and minorities are significantly underrepresented in the Information Technology industry. In fact, a recent study released by the Governor's Workforce Development Board recommended creating innovative and sustainable ways to address gender and racial disparities in the STEM and IT fields. As such, some EARN grantees have the secondary goal of diversifying the industry through targeted recruitment efforts and are doing so through the formation of unique and meaningful partnerships.

For instance, through targeted recruitment efforts and a close partnership with a variety of community-based organizations, the SANS Cyber Workforce Academy seeks to diversify the cyber industry's workforce by training and placing women and minorities into cybersecurity careers. A recent calculation found that nearly 40 percent of the participants trained were women, and 67 percent were minorities. Additionally, Baltimore Cyber is committed to diversifying the industry. Through their strong relationships with community partners, they have experienced great success. In 2020, 58 percent of the individuals trained in the Instrumentation and Control Systems Engineering Technology (ICET) program were minorities and 41 percent were women.

Finally, the Partnership for Tech Talent, led by Per Scholas, recently participated in a study with the W.R. Upjohn Institute for Employment Research, which confirmed that their work is helping their employer partners to diversify their workforce.



The study found that talent sourced from Per Scholas was significantly more likely to be Black or Hispanic than other individuals hired by companies for the same roles. More specifically, the study found that employers who partner with Per Scholas are 4.3 times more likely to hire Black and Hispanic workers, and 1.2 times more likely to hire women. Further, the Upjohn Institute study concluded that Per Scholas graduates were up to 50 percent less likely to be separated from employment after one year than others recruited in the same markets for the same positions.

Leveraging Funding

The Department of Labor continues to closely partner with the Department of Human Services (DHS), leveraging the Food Supplement Employment Training (FSET) Program as a means to train more Marylanders. Funded by the United States Department of Agriculture, the program connects people who receive monthly food supplement benefits (SNAP, food stamps) to industry led, job-driven training programs. The program requires a cost-match with non-federal funding. Participating programs are reimbursed up to 50 percent of allowable program costs, thus increasing the State and other non-federal funders' investment. Because EARN is a state-funded program, SIPs have the means to provide the cost match utilizing EARN funding.

To maximize access, Labor and DHS have worked together to provide outreach and education on the opportunities available to leverage different funding sources, including EARN and FSET. As a result, the number of EARN grantees receiving FSET funding has significantly increased since the program began in 2018. Currently, 14 EARN grantees are utilizing FSET funding, representing an increase of nearly 133 percent since the program began, and an increase of almost 30 percent over 2019. New EARN partners to FSET include Maryland New Directions, ITWorks, and Baltimore

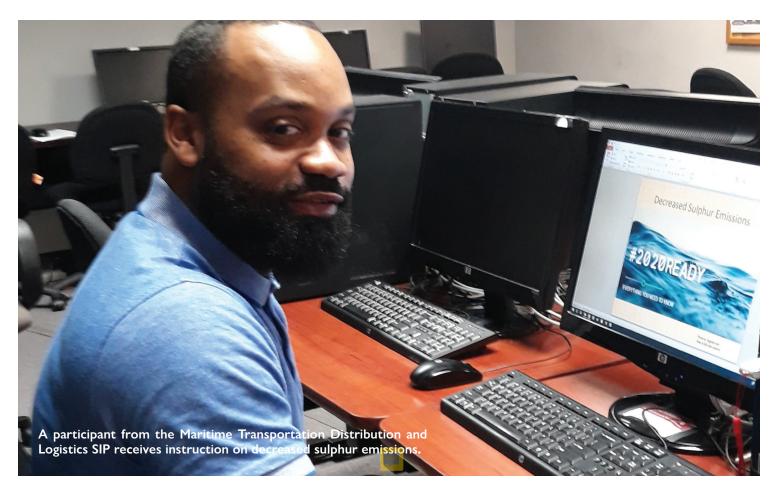
Cyber. In 2021, Labor and DHS will continue to partner on ways to grow the partnership between these two programs, which will ultimately increase the number of Marylanders able to access in-demand training opportunities.

Systems Change

Historically, employers in the biotech industry have required a college degree, even for entry-level positions. BTI, since its inception, has changed that paradigm of the degree requirement, as its graduates are job-ready when hired. This speaks to the caliber of BTI's curriculum and the level of preparedness and knowledge that graduates acquire in training. Employers indicate that BTI graduates have the trifecta of technical knowledge, hands-on training, and essential skills that make them ideal candidates for open positions. The universe of biotech employers considering candidates without college degrees has already expanded and is expected to continue to grow in the future.

Additionally, the COVID-19 pandemic and the dramatic increase in the demand placed on essential businesses has created conditions in which modification of hiring practices has become increasingly possible. Pompeian Olive Oil, a Baltimore-based manufacturing company, has seen a dramatic increase in demand for its products during the pandemic and has sought to rapidly increase their employee base to meet this demand. Although Pompeian has traditionally held a twoyear minimum experience requirement, their extreme need created conditions in which they were willing to consider less-experienced workers. Through an evolving partnership with Maryland New Directions, Pompeian decided to take a chance and hire one of their clients. With a successful outcome for both the client and the company, Pompeian has since expressed interest in hiring other individuals who are working with Maryland New Directions. Again, this speaks to the comprehensive, industry-led training provided by Maryland New Directions and the stellar case management services provided by staff to maximize the likelihood of success in the workplace for their clients. This paradigm shift is a win-win, expanding opportunities for the unemployed and underemployed individuals served by EARN Maryland, while providing a reliable and consistent pipeline of skilled individuals for Pompeian.

TechFrederick, which now includes 72 businesses, continues to cultivate a vibrant tech community in the Frederick region through its EARN partnership. While employer partners identify varying benefits such as cost savings and a more highly skilled and effective workforce, there are other meaningful benefits. For instance, the partnership held



its annual Hackathon event virtually this year. The event brings together tech employees from different companies in the Frederick area, forming teams to develop software solutions for nonprofit organizations in need. The teamwork, camaraderie, and dedication of these professionals and the ultimate delivery of high caliber tech solutions for nonprofit organizations is a shining display of the strength of the tech community in Frederick, which has been formed and fostered as a result of EARN.

Employer Satisfaction

The primary goal of EARN Maryland is to improve the business climate in the State through the cultivation of more highly skilled workforce. While the program is succeeding in growing the pipeline of qualified workers and providing valuable opportunities to incumbent workers, employers continue to remain satisfied with the quality of the program and identify their participation in EARN as a conduit for cost-savings, improved retention, and increased productivity.

BEACON recently surveyed employer and industry partners who participate in EARN to ascertain their perspective on the effectiveness of the program. When asked to rate the competitive advantage of EARN participants, 72 percent of survey respondents stated that they have a significant competitive advantage over their peers, with 27 percent responding that EARN participants have at least some

competitive advantage. Nearly 99 percent of respondents expressed that their participation in EARN is worth the investment and has had a positive impact on their business.

The survey also questioned employer and industry partners on whether COVID-19 has impacted their ability to participate in the program. Nearly 40 percent of respondents indicated that COVID-19 has decreased their hiring needs, while 24 percent stated it has impacted their ability to send incumbent workers to training. On the other hand, nearly 20 percent of employers who responded stated that COVID-19 has increased the necessity for training and upskilling. Employer and industry partners had the opportunity to provide open-ended feedback. A sampling of this feedback is provided below.

- "The associates we sent to training increase their skills and, in turn, bring that knowledge back to our business. I truly believe we are saving money on external consultants because of the increased abilities our associates gain in the training they attend."
- "We have grown over 176 percent with the help of EARN. More importantly, our team members went from 60 percent retention to 94 percent!"
- "The training my team engaged in not only made them more competitive, but also did the same for our company."

- "The retention rate of employees is up. Employees are happier that they have training we could not afford. We are getting larger projects because of this training. We are paying people more because we are doing more complex training."
- "This program is priceless."
- "The EARN program is of great value to our business. The training received allowed our new hires to immediately become valued employees who not only contributed to the business needs, but allowed them to earn significant income."

CONTINUED GROWTH

Since taking office, Governor Hogan has demonstrated steadfast commitment to EARN Maryland through targeted investments.

Information Technology/Cybersecurity

Governor Hogan has strategically added more than \$12 million in funding specifically to grow the pipeline of qualified workers for Information Technology and Cybersecurity industries. This added investment has allowed the program to grow the number of grantees targeting this industry and expand the geographic reach and capacity of grantees. To date, the program has placed more than 1,000 individuals into employment in the Information Technology and Cybersecurity industries and provided training for nearly 1,500 incumbent workers.

Green

Governor Hogan also committed three million dollars for green jobs training from FY18 to FY20. The Clean Energy Jobs Act, which passed during the 2019 Legislative Session, is providing eight million dollars to the Department of Labor beginning in FY21 to support clean energy job development through the utilization of Registered Apprenticeship, Pre-Apprenticeship, and Youth Apprenticeship.

The Department worked closely with the Maryland Energy Administration to develop a Solicitation for Implementation Grant Proposals to award new partners in response to this funding. Though delayed by COVID-19, the Department released the Solicitation for Implementation Grant Proposals in July of 2020. Given the intricacies in the Solicitation due to the parameters of the legislation, the Department hosted a pre-proposal webinar for prospective applicants. In response to the Solicitation, two proposals were received by the due date of October 2, 2020. The Department is currently awaiting guidance from the Office of the Attorney General to determine if the proposals meet the minimum requirements of the law before moving forward with the review process.

Opportunity Zones

In January of 2019, Governor Hogan announced a series of initiatives and legislation to support growth in Maryland's Opportunity Zones. Part of this investment included the establishment of Opportunity Works, which will provide funding to EARN SIPs that benefit jobseekers and employers in and around Maryland's 149 Opportunity Zones. The Department has provided this funding to organizations that are serving individuals who reside in Opportunity Zones, or are supporting businesses that operate in Opportunity Zones.

IDENTIFICATION OF STATEWIDE TRAINING NEEDS

The Labor and Employment Article § 11-709(b)(4) of the Maryland Annotated Code requires EARN SIPs to identify skills gaps, workforce shortages, and areas of opportunities within their industry. Based upon these needs, SIPs are challenged to develop innovative Workforce Training Plans that will efficiently and effectively bridge these identified gaps.

Based upon feedback from employer and industry partners, EARN SIPs are providing training to three distinct subsets of the workforce:

- Unemployed/Underemployed: Employers continue to identify the need for a pipeline of qualified individuals to fill their open positions. Unemployed refers to an individual without a job and who is available for work. Underemployed refers to an individual who is either working part-time but desires full-time employment, who works full-time but earns wages at or minimally above minimum wage, or who is working in employment not commensurate with the individual's demonstrated level of education and/or skill achievement.
- Incumbent: An incumbent worker is an individual who is employed already in the target industry, and who seeks to obtain additional training or credential. Employer partners identify incumbent worker training as a vital conduit for growth, expansion, and increased business outcomes. However, this training is costly, making it difficult for employers to invest with existing budgetary constraints. Therefore, many partnerships have been utilizing EARN funds to upskill incumbent workers, which has led to improved productivity, cost savings, wages, and job retention.
- Preparatory: Preparatory training serves individuals who are not ready to enter the workforce, but would benefit from training and education. Employer and industry partners identify preparatory training as an important tool for preparing the future workforce for employment opportunities in the coming years.

In 2020, along with the rest of the nation, Maryland's economy was significantly impacted by the COVID-19 pandemic. As such, training needs significantly changed across a variety of industries. As evidenced in the preceding pages of this report, grantees in these industries had to pivot training to meet the new demands brought on by COVID-19. As identified above, certain industries, including manufacturing, biotechnology, healthcare, and hospitality were forced to quickly pivot to meet rapidly changing needs.

Job Readiness and Essential Skills

For the partnerships offering training opportunities to unemployed and underemployed individuals, a key component of curriculum for these partnerships includes job readiness training. Job readiness training may include professional skills, literacy advancement, and financial coaching. Employers resoundingly identify a need for essential skills training. In fact, employer



partners identify essential skills training as equally, if not more important than, technical skills in evaluating a potential candidate. Essential skills, also known as soft skills, include professionalism, communication, timeliness, and customer service.

While job readiness and essential skills training remains a high priority for employers, the specific needs have changed due to COVID-19. For instance, partnerships needed to quickly develop training on how to work professionally in a virtual environment, including increased training on email etiquette and how to utilize virtual meeting platforms.

TRACKING SUCCESS, ACCOUNTABILITY, AND PARTICIPANTS

EARN staff work closely with each SIP to develop goals and measures of success for their individual partnerships. To ensure these goals are met, EARN staff provide tailored support and technical assistance to each partnership. This interaction includes but is not limited to site visits, regular meetings with grantees, and facilitating connections with peers or outside organizations to help further program success.

EARN staff strive to develop strong working relationships with each grantee in an effort to better understand the challenges and successes of each partnership and industry. Working collaboratively with grantees creates an environment of trust and support, allowing for continuous improvement and innovation. Through these relationships, staff are able to implement technical assistance plans if outcomes are not being met.

Due to the flexible composition of EARN, each partnership is unique in its goals and there are different means to measure success. Many elements are considered when developing goals, including cost per participant, average industry training costs, level of services provided, length of training, and the number of participants to be served. Similarly, a variety of different means are utilized to evaluate SIP success. Quantitatively, EARN partnerships are evaluated based upon the number of unemployed or underemployed participants who complete training and are placed into employment or the number of incumbent workers trained. Program staff review the Return on Investment (ROI), as calculated by BEACON, along with indicators such as new employers engaged and leveraged funding. Success can also be measured qualitatively. EARN staff take into consideration employer feedback, systems change brought forth as a result of the partnership, and participant success stories. To further evaluate partnership progress and success, grantees are required to submit the following reports to the Department:

- Quarterly Narrative Report tracks all programmatic activity, including project activities, program highlights, challenges, and success stories
- Quarterly Financial Report tracks projected versus actual expenditures and leveraged resources
- Entry Report captures all required demographic data
- Exit Report captures all required outcome data

Programmatic oversight is provided to ensure that the partnership is on track to meet timelines, outcomes, and other deliverables outlined in the Grant Agreement and that data are complete and accurate. Fiscal oversight is provided by at least three staff at the Department to confirm expenditures are allowable and reasonable. Per the Labor and Employment

Article § 11-709(b)(4) of the Maryland Annotated Code, EARN Partnerships are required to collect and track certain demographic data for all participants taking part in EARN funded training, including sex, race, national origin, income, county of residence, and education attainment. Following the completion of training, partnerships must track certain outcome data, including whether each participant obtained a new credential or certification, identifiable skill, a new employment position, or a title or wage promotion. The required metrics covering July 1, 2019 through June 30, 2020 are included as Appendix A to this report.

Third Party Evaluation

The EARN program continues to partner with BEACON at the Perdue School of Business at Salisbury University to evaluate the effectiveness of the program. The broad areas for evaluation include assessment of the value to trainees, the value to employers, the quality and effectiveness of the partnership, and systems change among and within the industry and partner institution.

The staff at BEACON work closely with representatives from each SIP to understand the challenges and successes of the individual programs. These interactions frame the report that BEACON submits to the Department on an annual basis. This report, which includes all interview, case study, reporting, evaluation, and accountability documents and tools, provides an independent evaluation of EARN's impact. In this report, BEACON highlights the economic impact study completed in 2020. As highlighted above, for every dollar the State invests, an additional \$17.32 in economic activity is created. The nationwide average ROI for workforce development programs is \$3.41. This further illustrates the value of the industry-led model and EARN's impact on economic and workforce development in Maryland.



CURRENT EARN MARYLAND STRATEGIC INDUSTRY PARTNERSHIPS

The following section provides a list of the SIPS that were active in 2020, the region in which they are operating, and a programmatic update.

Transportation/Logistics

Susquehanna Transportation and Logistics SIP

Region: Susquehanna

In 2020, the Susquehanna Transportation and Logistics SIP began offering the Professional Truck Driver Institute certification. This certification, which is highly sought after by employers, sets the national standard for excellence in Commercial Driver's License (CDL). Individuals with this certification are more likely to have the minimum years of experience required for new hires waived by insurance companies, which is an added benefit and cost savings for employers. Unfortunately, due to COVID-19, training was paused in March and did not resume until September. The Partnership looks forward to resuming full programming in 2021.

Participant Success Story: Prior to enrolling in training, Mia, a single mom, struggled to provide for her family. She had dreams of becoming an owner-operator and working in her family business. She excelled in training and was one of the top students in the class. She is now employed, earning \$17.50 per hour.

Mid-Maryland MOVE Region: Montgomery County



Mid-Maryland MOVE continues to work with employer partners, such as Montgomery County Public Schools, to provide in-demand training to meet the growing need for CDL drivers. Over the past year, the partnership has pivoted to provide more CDL A training slots in response to industry demand. Additionally, based upon student and employer feedback, the essential skills portion of the training was shortened. This important change will allow for students to obtain employment faster. Despite being closed from March through August, the partnership estimates meeting all training goals.

Employer Feedback: "Our pool of Bus Operators increased in the type of qualified candidates. We were able to attract qualified and capable Bus Operators into our workforce and we are able to extend further into the community to recruit and hire these qualified candidates. We are looking forward to continuing this funding for our workforce to ensure that we can continue to impact the lives of members of our community in a positive way!"

Western Maryland MOVE Region: Western Maryland

Led by Hagerstown Community College, this partnership continues to provide training to meet the needs of more than 20 transportation and logistics-focused employers in Western Maryland. Despite COVID-19 restrictions, the partnership provided training for CDL A, CDL B, Forklift Operator, and Diesel Mechanic in 2020. Western Maryland MOVE continues to work closely with the Washington County Sherriff's Day Reporting Center to serve justice-involved individuals, providing in-demand training opportunities and certification.

Participant Success Story: Ira was pursuing a career in the medical field when she had to change course due to mounting tuition costs. She was able to receive EARN funding through Western Maryland MOVE and earned her CDL B with passenger endorsement. Soon after training, she was able to obtain employment earning more than \$22 per hour.

Maritime Transportation and Logistics Partnership Region: Baltimore

Led by Maryland New Directions (MND), the Maritime Transportation Distribution and Logistics (MTDL) Partnership worked with an estimated 25 employer partners in 2020, growing and fostering these relationships to meet the growing and changing demand in the transportation and logistics industry brought on by COVID-19. The Maritime Transportation Distribution and Logistics (MTDL) and Commercial Transportation Careers (CTC) programs both transitioned to a virtual learning environment to ensure that a qualified pipeline of candidates were available to meet the growing demand. The partnership reports that 71% of graduates have obtained employment earning an average of \$15.27 per hour.

Participant Success Story: Mark completed his MTDL training in February of 2020 and earned his Transportation Worker Identification Card. Although only released from prison in late 2019 after serving a 16-year sentence, Sean was determined to begin a fresh life and secure gainful employment. On May 2, 2020, in the midst of the pandemic, Sean started a full-time position with Schmidt's Bakery earning a wage of \$16.40 an hour. Of his experience, Mark stated, "On February 28th I graduated from Maryland New Directions. However, the certificate I was awarded pales in comparison to the genuine, sincere benevolence and magnanimity I received from the entire MND staff. I can name all of the educational benefits that MND provides (for free by the way), e.g., the computer training, the job readiness programs, the history and inner workings of the Port of Baltimore, the CDL training & license, among other things. But none of this matters (at least not for me) if an organization doesn't genuinely care about you, your well-being and have your best interest at heart. And I can attest that EVERYONE at MND unequivocally and indubitably cared about its students; and that matters most! That's what sets MND apart from the rest and makes them unique. They were highly instrumental in me gaining employment and this letter is a token of my gratitude for MND."

A Road to Success Region: Anne Arundel County

Recognizing that the need for skilled drivers spans many sectors, including construction, logistics, and passenger transport, A Road to Success has partnered with a wide variety of employers to ensure that their diverse needs are met. Through the Transportation and Logistics Business Collaborative, employers continued to meet during COVID-19 to identify skills gaps and new training needs that surfaced as a result of the pandemic. For instance, one employer identified a need for a commercial license different from what the partnership was offering. The partnership, once able to offer training, will pivot to ensure that this need is met for their employers.

Participant Success Story: John lost his job as a professional CDL B driver and was looking to return to professional driving at a higher level than he was before his lost his job. He enrolled in the program to pursue his CDL A license. He completed the class, passed the driving test, and got a job, all within a three-month time span. He is still employed as a Driver at a higher rate of pay than before his job dislocation and with plenty of very well paid overtime opportunities. Additionally, his company, Wagman Construction, offers a full benefit package. When asked for comment, Mr. Lindsey says, "I do truly appreciate what the program has done for me and my family."

Biotechnology

Baltimore BioTechnology Strategic Industry Partnership Region: Baltimore

Led by Baltimore BioWorks, this partnership continues to provide training that prepares individuals for entry-level positions in biotechnology. Working in close partnership with Baltimore City Community College, the Baltimore BioTechnology SIP is providing customized training based upon employer demand in topics such as biotechnology manufacturing and quality control. To date, the partnership has placed over 300 individuals into employment, with many students pursing higher education in the field.

Participant Success Story: Rx Remedies, a Baltimore based company, has hired several Baltimore BioWorks graduates for entry level biotechnology manufacturing and quality control positions. Rx Remedies happily notes that "all hires have been very successful, so successful that the individuals have been promoted from within to production supervisors."

Baltimore BioPrep Region: Baltimore

Led by the BioTechnical Institute of Maryland (BTI), Baltimore Bio Prep provides a combination of technical and essential skills training to prepare individuals for entry-level careers in bio-pharma, bio-pharma manufacturing, bio-hazard identification, chemical testing, biodefense, marine bio, food safety, human/animal health, environmental, bio manufacturing and clinical settings. In 2020, the partnership continued to place individuals into employment at a high rate with an average starting wage of \$17 per hour.

Industry Feedback: "We want to hire more of your graduates! We love them as they have the necessary skills we are looking for when hiring especially their documentation ability. In fact, they are more prepared than recent college graduates being hired by the company."

BioTrain Region: Montgomery

BioTrain continues to engage with their industry partners to understand the current training needs for incumbent workers. They have experienced great success with employer partners- AstraZeneca, Estee, National Institutes Health, Johns Hopkins University, and Sanaria Inc. in identifying specific training needs. The partnership plans to deliver a variety of trainings in the coming months on topics such as quality control and operating in a regulatory environment. Due to COVID-19, training was paused in March and did not resume until September. BioTrain looks forward to resuming full programing in 2021.

Hospitality

Building Employer-led Alliances for Careers in Hospitality

Region: Eastern Shore

This partnership, led by Wor-Wic Community College, continues to support the hospitality industry, which has been impacted significantly by COVID-19. In October, the partnership launched a new training in response to employer identified COVID-19 related needs. By pivoting from their standard customer service training, the partnership was

able to meet the needs of the industry while also addressing specific COVID-19 challenges.

Industry Feedback: "We now have many locals that are employees, which benefits the area. We also have quite a few people that had no experience in the gaming industry that are now trained with a skill that they can use in almost all 50 states. The more locals we can hire, the better the benefit for the Eastern Shore. It allows us to keep money and jobs local which in a small area like the Eastern Shore is priceless!"

FoodWorks Culinary Training Program Region: Baltimore

Led by the Maryland Food bank (MFB), this partnership provides a 12-week thorough training course to individuals on topics such as food safety, kitchen equipment, and knife skills. In addition to moving individuals toward a pathway out of hunger through workforce development, FoodWorks is unique in that each class of students prepares on average 20,000 meals for food-insecure communities, rather than cooking for paying patrons. By incorporating giving back to their communities during their training, they build morerounded, positive, and thoughtful future employees.

Participant Success Story: "I truly appreciate every step and moment that I've had to be a part of this program because I've never been successful at anything that was this powerful in my life. FoodWorks has pushed me to limits I thought couldn't be pushed... to doing things and reading things I never thought I would have. Chef Christina was the best person to give me hope. She told me I could do this, and I did. I wanted to do this to show my son it doesn't matter how old you are, or how long it takes you, as long as you can get it done. Thank you to all the staff at the Maryland Food Bank who've helped me through this program."

Cyber/Information Technology

IT Center for Excellence Region: Western Maryland

Led by Allegany College, the IT Center for Excellence continues to provide in-demand training to meet the needs of employers in Western Maryland. The need to upskill incumbent workers remains a high priority for the partnership. In 2020, the partnership provided training to nearly 90 incumbent workers in a variety of topics, including Security+, Information Technology Infrastructure Library, and Certified Information Systems Security Professional.

Industry Feedback: "This program enables us to get training that we could not otherwise afford. With the training offered

through the EARN program, my associates are staying on top of cybersecurity technology, enabling our institution to continue to fight to stay ahead of the cyber criminals. We have been able to tackle problems with existing staff, where in the past we had to outsource some cybersecurity duties to consultants. This training enables us to grow our associates while providing immediate value back to the business."

mHealth

Region: Howard County

In 2020, mHealth offered training for the Certified Professional in Healthcare Information and Management Systems (CPIHIMS) certification. This training was offered in a boot camp format, and was moved to a virtual format in light of COVID-19. Past training that targeted incumbent workers included topics such as Health Analytics and Certified Professional in Healthcare Information and Management Systems.

Participant Feedback: "Training was helpful in expanding skillset. Quick application to current job."

Tech Frederick

Region: Western Maryland

The goal Tech Frederick is to help Frederick become the hub for Information Technology in the region. Tech Frederick closely collaborates with its employer partners to identify in-demand, relevant training opportunities that will make their current workforce stronger. In 2020, the partnership delivered training to more than 200 incumbent workers in topics like AWS DevOps Engineering, Project Management, and Systems Operations.

Industry Feedback: "One of our staff took an Adobe Photoshop course to expand her skills. We anticipate that her new skills will enable the department to do more design in house thereby providing some additional cost savings to the department attributed to outsourcing projects."

CyberWorks

Region: Anne Arundel County

Led by Anne Arundel Workforce Development Corporation, CyberWorks seeks to meet the need of its diverse employer partners by providing customized training based upon employer-identified training needs. Individuals also receive industry mentorship, on-job-training, and industry-recognized credentials. In 2020, the partnership continued to place participants into employment in positions such as SOC Analyst, Project Coordinator, and Tech Analyst. In its most recent grant, the partnership placed 100 percent of individuals who completed training.

Participant Success Story: Michael had been unemployed for a few months when he enrolled in the CyberWorks program. He received technical and handson training, earning his Network+ certification. Upon completion of training, he obtained employment as an IT Help Desk representative, earning \$18 per hour.

What Trainees are Saying...

"I do truly appreciate what the program has done for me and my family."

"Chef Christina was the best person to give me hope. She told me I could do this, and I did. I wanted to do this to show my son it doesn't matter how old you are, or how long it takes you, as long as you can get it done. Thank you to all the staff at the Maryland Food Bank who've helped me through this program."

"This program has changed my life tremendously. I was satisfied and awed by the support I received in the program. I truly believe that I can achieve anything I put my mind and heart to. Thanks to all the supporters at NPower!"

"The instructor-led courses, and the online materials and test preparation were more than I expected and were instrumental to enabling me to successfully pass all the certification exams on the first try. These certifications gave me renewed confidence when I started a cyberspace operational planner position with SAIC supporting U.S. Cyber Command."

Intrusion and Countermeasures Education and Training Region: Baltimore City

The Intrusion and Countermeasures Education and Training Partnership was successful in going virtual early in the pandemic, which allowed for limited disruption to training. The partnership continued to provide technical and hands-on training to unemployed and underemployed individuals. Of the individuals who completed training in 2020, 91percent obtained employment, earning an average starting wage of more than \$14 per hour.

Participant Success Story: Prior to his ICE T training, this graduate was a part time security guard for a real estate company with no prior experience in IT or Cyber earning \$15 per hour with no benefits. Upon completion of all five ICE T modules and earning four IT/Cyber industry recognized certifications that are part of the ICE T program, this graduate received a full time Cybersecurity Analyst position with a cybersecurity company in Baltimore with an annual salary of \$68,000 and full benefits.

Partnership for Tech Talent

Region: Montgomery County and Baltimore City

The Partnership for Tech Talent, led by Per Scholas, transitioned to virtual learning, allowing students to continue training with limited disruption. Students have the option to enroll in two different tracks, IT Support and Cybersecurity, where they can earn A+, Network+ and Security+ certifications. To date, more than 200 individuals have obtained employment as a result of EARN funding.

Participant Success Story: Mariah found herself unemployed as a result of COVID-19. She applied and was accepted into Per Scholas' program in May of 2020. She graduated in August 2020 with highly sought-after certifications. She is currently employed as a Facility Operations Center Engineer, earning more than \$30 an hour, which represents nearly five times the amount she was making prior to enrolling in the Per Scholas training program.

Susquehanna IT/Cyber Partnership

Region: Susquehanna

Led by the Susquehanna Workforce Network, the Susquehanna IT/Cyber Partnership seeks to grow the talent pipeline in the region. With the help of their partners, Cecil College and Harford Community College, the partnership was able to launch online training amid COVID-19. Students are preparing to earn industry-recognized credentials, such as CompTIA A+, Network+, and Security+. To date, 80 percent of graduates have obtained employment.

Participant Success Story: Despite the pandemic, two recent graduates have obtained employment supporting companies at Aberdeen Proving Grounds.

SANS Cyber Workforce Academy

Region: Statewide, with a focus on the Capital and Central Regions

Participants in the SANS Cyber Workforce receive advanced technical training and hands-on cyber defense and incident handling skills, and have the opportunity to earn industry-recognized certifications including the Global Information Assurance Certification and the Global Certified Incident Handler. To date, more than 70 individuals have obtained employment, earning an average of nearly \$40 per hour.

Participant Success Story: Annie was a single mother who found herself the go-to person to troubleshoot IT issues in her former role as a customer service representative for a mattress store. This is where she discovered her passion for cybersecurity. However, she did not have the means to pursue conventional educational routes into the field. She completed both her GIAC Security Essentials Certification and GIAC Certified Incident Handler certifications in the Academy and accepted a role as an IT Administrator with cybersecurity responsibilities at a local employer, Unity Technologies. Due to the excellent technical skills gleaned from her training and her two GIAC certifications, the company decided to convert the internship to which she applied to a full-time salaried position with benefits.

NPower Tech Fundamentals Program

Region: Baltimore

The NPower Tech Fundamentals Program prepares unemployed and underemployed individuals for promising careers with in the IT and Cybersecurity industries. The program was able to transition to virtual learning early on in the pandemic. The program offers two tracks: Tech Fundamentals combines 16 weeks of a rigorous classroom-based curriculum with professional skills development followed by a seven-week paid internship for students to gain basic competencies needed for quality employment. The second track, Cybersecurity, consists of 18 weeks of hands-on classroom instruction followed by a 12-week paid internship to prepare students for cybersecurity-related careers. To date, nearly 140 individuals have obtained employment with industry partners such as Northrup Grumman, TD Ameritrade, and Under Armor.

Participant Success Story: Before NPower, Marcus was working long hours, earning \$14 per hour as a mechanic. He enrolled in the NPower program and earned industry-recognized certifications. Upon completion of his internship, Marcus obtained employment earning \$20 per hour. Of his experience, Marcus said, "This program has changed my life tremendously. I was satisfied and awed by the support I received in the program. I truly believe that I can achieve anything I put my mind and heart to. Thanks to all the supporters at NPower!"

Certified Cyber Analyst Operator Region: Central Maryland

Led by UMBC Training Centers, this partnership is working to address the cyber workforce training needs of the military, the intelligence community, federal civilian agencies, and the commercial sector through a blend of classroom and hands-on technical training. The program successfully transitioned to virtual learning and participants are at varying stages of completion.

Participant Feedback: "The UMBC Training center CCAO program truly helped me prepare for my transition from the military. I entered the civilian workforce in a much better position than I ever imagined. The knowledge, and more importantly, the experience, CCAO provided me created a distinct advantage over many other applicants while securing my employment. Even two years later, I owe the program my ability to apply what I learned to new cybersecurity tasks, both personal and professional."

Baltimore Cybersecurity Partnership Region: Baltimore City

The Baltimore Cyber Security Partnership, led by I'm Still Standing Community Corporation, is providing training to unemployed and underemployed Baltimore City residents to prepare them for careers in cybersecurity. Students are prepared to earn industry-recognized credentials, such as A+, and receive hands-on experience through lab training. The partnership successfully transitioned to virtual learning and students are completing training.

Participant Success Story: Marcus, who was unemployed when he entered the program, earned industry-recognized certifications as a result of his training. Soon after completion of training, he obtained employment installing networks, earning nearly \$40 per hour.

Advancing Careers in IT

Region: Baltimore

Employers participating in this partnership have identified a need for streamlined and practical training within the IT sector for incumbent workers who need to add their technical skills. COVID-19 significantly impacted the operations of this partnership, but it is anticipated that programming will resume in 2021.

Maryland Cyber Skills Alliance

Region: Statewide

The Maryland Cyber Skills Alliance is seeking to address the growing shortage of skilled cybersecurity professionals by providing training that leads to industry-recognized certifications and maps directly to high demand jobs. CompTIA and Transmosis the

organizations leading this effort, are focused on recruiting unemployed and underemployed individuals. To date, more than 40 individuals have obtained employment.

Participant Success Story: "I am very thankful for the opportunity to participate in the EARN Maryland program. When I retired from the Navy and started looking for a civilian position, I felt my lack of formal education and certifications were a shortfall in my resume. Working with [the partnership] I was able to quickly complete my CompTIA A+ and Security+ certifications. I had previously attempted the A+ certification, but found the amount of material overwhelming. The instructor-led courses, and the online materials and test preparation were more than I expected and were instrumental to enabling me to successfully pass all the certification exams on the first try. These certifications gave me renewed confidence when I started a cyberspace operational planner position with SAIC supporting U.S. Cyber Command."

Health IT SIP Region: Central

The Health IT SIP, led by Community College of Baltimore County (CCBC), works closely with large healthcare employers, such as LifeBridge Health, Frederick Memorial Hospital, and Anne Arundel Medical Center, to provide integral training opportunities to incumbent workers. In 2020, programming was delayed as employer partners were unable to send employees to training due to COVID-19. Once able, courses transitioned to being taught virtually. Despite the demands of COVID-19, employers remain engaged and plans are being made for additional training opportunities in 2021.

Industry Feedback: "The two educational offerings, Project Management and Value Based Care, that our team members participated in have truly brought both employee and organizational value. Members of our team who attended the project management course leveraged knowledge and skills gained to support internal project work and some even leveraged for their own career advancement into an internal project management role or obtained their PMP certification. Several team members attended the Value Based Care course as well and it helped those individuals advance their knowledge to better support and collaborate with our Population Health and Value Based Care teams. Both areas are transforming healthcare for our organization and the value-based care course really made a difference for those who attended and positioned them to better support technology implementations for these areas. We are very appreciative of these course offerings and they were opportunities we might not otherwise be able to offer or fund."

Advanced Cybersecurity Training Consortium Region: Statewide

The Advanced Cybersecurity Training Consortium, led by Baltimore Cyber, is a collaboration with all 16 of Maryland's Community Colleges and more than 30 employer and industry partners. This training is meant to increase the employability of students by providing advanced training via hands-on, real-world scenarios. To date, the partnership has placed more than 200 individuals into employment, including more than 100 graduates in 2020.

Participant Success Story: Prior to entering the program, this graduate had no prior experience in IT or Cybersecurity. Upon completion of her work including her ACT training and accompanying certification, she received full-time employment in cybersecurity at an annual salary of \$83,200 with full employee benefits. The SIP takes great pride in this graduate not only because of individual success but also because the graduate and the ACT training she received exemplifies how the SIP is positively addressing the significant underrepresentation of African Americans and females in the IT/Cyber workspace.

Cybersecurity Education and Certification Program Region: Baltimore

The Cybersecurity Education and Certification Program, led by the CCBC, is providing in-demand, relevant training to unemployed, underemployed, and incumbent workers. Students have the opportunity to earn a variety of certifications, including Network+, Security+, and Ethical Hacker. The partnership was able to successfully transition to virtual learning and continues to provide meaningful training and employment opportunities to students.

Healthcare

Baltimore Healthcare Partnership Region: Baltimore

In 2020, the Baltimore Healthcare Partnership, led by the Baltimore Alliance for Careers in Healthcare (BACH), continued to closely partner with the seven major hospitals in Baltimore City and a wide array of community-based organizations to provide training to unemployed, underemployed, and incumbent workers. Based upon employer feedback, the partnership provided training in Certified Nursing Assistant, Geriatric Nursing Assistant, Patient Care Technician, Certified Medicine Aide, and Central Sterile Tech Processor. In response to an emerging need related to COVID-19, the partnership implemented contact tracer training. Since program inception, the partnership has placed over 600 individuals into employment.

Participant Success Story: "I am currently employed at Baltimore City Health Department. My current employment is due to the training that I received for Contact Tracing. This opportunity is something I've been dreaming about. Just to be on board is an honor. I would like to thank the whole staff for this opportunity, thank you for believing in me."

Specialized Nursing Bridge Program Region: Montgomery County

The Specialized Nursing Bridge Program, led by Adventist, continues to work to increase retention among first year nurses through their nurse preceptor training program. It has been estimated that 43 percent of new nurses tend to leave the field within the first three years. The training provides added support and learning in an effort to decrease this attrition. A skilled healthcare workforce is needed now more than ever, and the partnership was able to train one of their



largest cohorts in 2020. To date, over 350 individuals have received training and employers report an increase in employee retention.

Participant Success Story: "I am a nurse resident at Shady Grove Hospital in the Medical Surgical flex unit. Being in the nurse residency program has been a wonderful experience. I have felt supported every step of the way and it is very important for me, especially as I am a new nurse. My orientation was 4 months long and, in that time, I felt adequately prepared to begin working on my own and as well as being part of the team with my unit. I have the opportunity to meet other nurses from other specialties along with interacting with each other and learning about the experiences from their specialties so that also been an enlightening experience for me. Finally, the nurse residency coordinators have been very supportive. They have so many resources available to us and just knowing that they're there for me has been great. So overall I feel blessed and happy to be in the residency program and I'm thankful for the way the program is structured."

Healthcare Mentorship Baltimore Region: Baltimore Region and Western Maryland

Healthcare Mentorship of Baltimore, led by New Pathways, a program of Pressley Ridge, focuses on providing training opportunities to youth who are interested in becoming employed in the healthcare field as Certified Nursing Assistants (CNA), Geriatric Nursing Assistants (GNA), and Patient Care Technicians. New Pathways experienced a short shut down as they successfully transitioned to online learning. To date, New Pathways has placed over 130 individuals into employment, with many earning wages of up to \$15 per hour.

Participant Success Story: Upon graduating from high school, Stella was unsure of what she wanted to do next. She knew she was interested in healthcare but was not ready to fully commit to college until she gained a broader understanding and experience that would enhance her skill set and increase her confidence. Stella's guidance counselor gave her a flyer for one of Healthcare Mentorship Maryland's upcoming information sessions, and she decided to attend.

After the session, Stella connected with the Case Manager, who helped Stella discuss her goals and determine if the program to be a good fit for her to take the next step in her career. Throughout the program, Stella excelled in both essential skills and technical training. Upon graduation, she accepted a GNA position in a Genesis nursing home, where she has now worked for nearly six months. As a young adult, Stella truly enjoys having the stability of full-time employment; this is a considerable accomplishment at her age. She is looking forward to the possibility of completing an incumbent worker GNA to LPN program within the next few years.

Ready to Care Region: Eastern Shore

Ready to Care, led by the Eastern Shore Area Health Education Center (ESAHEC) provides CNA and GNA training all throughout the Eastern Shore where there is a significant shortage of healthcare workers. Due to the pandemic, training was paused from March until August. Given the dire need for healthcare workers, the partnership was able to quickly provide a hybrid training model of virtual and in-person learning. Through their strong partnership surrounding colleges, the partnership has placed nearly 115 individuals into frontline healthcare positions.

Baltimore Regional Healthcare/Higher Education SIP Region: Baltimore

Led by Humanim, the Baltimore Regional Healthcare/Higher Education SIP leverages relationships with large anchor institutions such as John Hopkins Health Systems, Towson University, and Mercy Medical Center, to provide meaningful training and job opportunities in the Administrative Healthcare field. Due to COVID-19, there was a short pause in training but Humanim was successful in converting their program to half virtual learning and half in person, when deemed safe to do so. In 2020, Humanim was recognized by Towson University for the positive impact created from the collaboration between Humanim's Workforce Development programs and Towson University. To date, more than 50 individuals have been placed into employment, with many earning wage increases and title promotions due to stellar performance.

Industry Feedback: "The program has allowed TU faculty and staff in need of temporary administrative support to quickly meet their needs while providing much-needed experience in the workplace. Over the past four years, temporary employees at TU have successfully moved into full-time positions, primarily at TU but at other anchor institutions as well. Currently, six TU offices have Humanim graduates in permanent administrative positions after completing their temporary assignments. Not only is TU benefitting from Humanim's thorough and high-quality training program, but members of our community are getting life-changing opportunities with steady and consistent employment."

PharmaTech Connect Region: Baltimore City

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PharmaTech Connect, led by Goodwill Industries of the Chesapeake, continues to grow its partnership with CVS Health and provide training to individuals who desire to become pharmacy technicians. Following a 12-week class, students have the



opportunity to gain hands-on experience in a mock pharmacy prior to completing a clinical experience. Due to COVID-19, training was paused in March and did not resume until July, when the partnership shifted to virtual learning. To date, 31 individuals have been trained, with 23 obtaining employment as Pharmacy Technicians.

Participant Success Story: In February 2020, Lydia enrolled in the pharmacy tech program. Due to COVID-19, PharmaTech Connect's training was shut down in March. She was able to resume training virtually in July, completing the program in August. She passed the Pharmacy Technician Certification Exam and obtained her CPR certification. Lydia completed her clinical experience, receiving stellar reviews related to her performance and attendance. Her clinical ended in October and one day later she was offered a full-time position with CVS. Lydia notes, "I am grateful for this opportunity! I am grateful for Goodwill's support and belief in me."

PharmaTech Connect participant training in their mock pharmacy to gain hands-on experience needed to become a Pharmacy Technician.

Community Health Workers Partnership Region: Frederick

This unique partnership provides Community Healthcare Worker training to individuals in Western Maryland. Community Health Workers play a vital role in healthcare delivery, serving as an intermediary between health and social services and the local community. Over the last year, this partnership has provided training to nearly 40 unemployed, underemployed, and incumbent workers.

Participant Success Story: Abby moved to the United States in 2005 on a tourist visa. After a debilitating divorce, Abby was connected to the Asian American Center of Frederick. She was able to enter the Community Health Worker training program, completed, and was able to land a job! Abby is now able to support her son and is very grateful for the training.

Healthcare Partnership of Prince George's and Charles Counties Region: Prince George's and Charles Counties

The Healthcare Partnership of Prince George's and Charles Counties led by ItWorks Learning Center is providing a steady pipeline of entry-level workers in healthcare, providing CNA and GNA, and Patient Care Tech training. Due to COVID-19, there was a short pause in training, but the partnership was able to quickly mobilize and convert their training to virtual learning. To date, nearly 120 individuals have obtained employment.

Industry Feedback: Employer Partner FutureCare reports significant cost savings as a result of their relationship with the partnership. FutureCare further noted that, "the ItWork's graduates have noticeably higher placement and retention rates, compared to all other new hires."

Maryland Direct Support Professional Training Consortium Region: Montgomery

The Maryland Direct Support Training Consortium provides competency-based, credentialing training to Direct Support Professional (DSPs) who support people with intellectual and developmental disabilities. DSPs, now more than ever, are in high demand due to COVID-19. In a recent report, "Results of the Direct Support Workforce and COVID-19 National Survey 2020," produced by the Institute on Community Integration at the University of Minnesota and the National Association of Direct Support Professionals, it has been noted that 50 percent of DSPs have left their positions. To date, the partnership has trained over 150 DSPs, providing new credentials and increased wages, which is helping to decrease attrition.

Industry Feedback: "This training has been vital during COVID-19 for our staff. Learning to be comfortable with a virtual classroom has helped DSPs and Mentors make the leap to providing virtual supports to people who are house-bound. But they are also providing a lot of in-person support to people who are ill or vulnerable, and our agency has been hit harder than others with COVID-19 this past spring. The Mentor and Trainer community has provided a community of practice of sorts, and a kind of support group."

Green

Clean Energy Training Partnership – Howard Region: Howard County

Led by Power52, in close collaboration with 11 industry partners, the Clean Energy Training Partnership is preparing unemployed and underemployed individuals for careers in the solar industry. The partnership was able to successfully transition to virtual learning while providing important support services for students. This will allow for greater geographic diversity moving forward. Nearly 90 percent of graduates are placed into employment.

Participant Success Story: "My experience with Power52 has been a breath of fresh air and a beacon of hope for those of us who are fortunate enough to participate in this program. Everyday has been encouraging with the Power Principles to help us to face the challenges of life. I would definitely recommend this program to anyone who is looking to work in this field and improve their skills."

What Employers are Saying...

"We want to hire more of your graduates! We love them as they have the necessary skills we are looking for when hiring especially their documentation ability. In fact, they are more prepared than recent college graduates being hired by the company."

"The two educational offerings, Project Management and Value Based Care, that our team members participated in have truly brought both employee and organizational value... We are very appreciative of these course offerings and they were opportunities we might not otherwise be able to offer or fund"

"The ItWork's graduates have noticeably higher placement and retention rates, compared to all other new hires."

"With the training offered through the EARN program, my associates are staying on top of cybersecurity technology, enabling our institution to continue to fight to stay ahead of the cyber criminals... This training enables us to grow our associates while providing immediate value back to the business."

Solar Installation Training Partnership Region: Baltimore City

The Solar Installation Training Partnership is providing in-demand training to unemployed, underemployed, and incumbent workers. Participants in the entry-level training receive safety training, hands-on practicum, and 320 hours of on-the-job training. As of this report, 90 percent of those who completed training have obtained employment. Employer partners also identified a need to upskill their current workforce in topics such as leadership, project management, energy analysis, and sales skills. To date, more than 60 incumbent workers have received training.

Participant Success Story: John graduated from the SITP Module 1 Solar Installer Training Program in July 2019. Prior to enrolling in the program with Civic Works, John was recovering from substance abuse disorder and having difficulty addressing mental health complications. Lack of transportation, his criminal record, and child support restrictions were additional systemic barriers that made it difficult for him to find family-sustaining employment. When he heard about Civic Works' program through a veteran's job reentry program, John decided to enroll in the solar track and gain the skills needed to succeed in the industry. John excelled in the Solar Installer Program, and gained crucial skills, hands-on training, and valuable experience in the solar industry. Furthermore, in addition to the technical training, the program's wrap-around supportive services also helped John to address systemic barriers that impacted his employment prospects. Case managers worked closely with him to provide support around child support intermediation, transportation, court hearings, and behavioral and mental health needs. Through these classes and Civic Works' wrap-around supportive services, John built the skills and stability he needed to both secure and maintain employment. Soon after graduating, John was hired by Solar Energy World, and currently makes an hourly wage of \$18/hour as an Installer Helper.

Wor-Wic Welding SIP Region: Eastern Shore

In the coming years, the demand for welding positions on the Eastern Shore is expected to significantly increase. To meet this demand, the Wor-Wic Welding SIP is providing relevant, in-demand training for entry-level positions. Over the 13-week program, students are prepared to test for American Welding Society certifications. To date, nearly 90 individuals have obtained employment with employers such as Chesapeake Shipbuilding, Delaware Elevator, Crystal Steel, and Cambridge International. Though COVID-19 significantly hampered this partnership's ability to deliver training, the partnership is optimistic about operations in 2021.

Participant Success Story: "I'm so glad I got the opportunity to go through this program. I came in on time every day. I was learning so much, I even came in early some days because I just couldn't wait to start class then be able to go to the booth to weld. I continued to grow my skill set and I took my time learning all I needed to know. That meant paying close attention to my instructor. By the time I knew it I was welding! I was learning all types of positions and learning to master what I was being taught. Before I knew it, it was time to graduate! I was on my way to my new job at Cambridge International! Life is good!"

Clean Energy Training Partnership – Baltimore Region: Baltimore City

Led by Living Classrooms Foundation, this partnership implemented its needs-based employment training meant to prepare unemployed and underemployed individuals for employment in the renewable energy industry. The comprehensive program blended classroom training, handson experience, job coaching, and essential skills training. In 2020, the partnership continued to work with recent graduates on job placement. To date, 84% of graduates have obtained employment and 61 individuals have earned industry-recognized certifications.

Participant Success Story: Corey, who was unemployed when he entered training, obtained employment as an electrician earning \$22.50 per hour. Additionally, he was accepted into the Independent Electrical Contractors Registered Apprenticeship program, placing him on a true career path.

Sustainable Energy Workforce Development Program

Region: Prince George's County

In an effort to meet the growing demand for qualified workers, the Sustainable Energy Workforce Development Partnership is providing comprehensive training to unemployed and underemployed Prince George's County residents. The Industry Advisory Council established by Employ Prince George's played a critical role in shaping curriculum and program activity. To date, 26 individuals have obtained employment.

Participant Success Story: Juan is originally from El Salvador and has been in the United States working in maintenance performing odd jobs for the last 35 years earning most recently \$12 per hour. He had never had an opportunity to complete a training course connected with the community college because of the language barrier. He successfully completed the solar panel photovoltaic ELL training with Prince George's Community College in partnership with CASA de Maryland. He expressed pride and gratitude for the opportunity to be associated with a college. Juan is now earning \$15 per hour and looks forward to pursuing additional training and increasing his income.

Solar Installation Training and Examination Partnership

Region: Western Maryland

The Solar Installation and Training Examination Partnership, led by Hagerstown Community College, is responding to the needs of its five employer partners by providing training to

unemployed, underemployed, and incumbent workers. To date, nearly 30 incumbent workers have received training. This partnership was significantly impacted by COVID-19 but is actively planning training opportunities for 2021.

Energy Efficiency Strategic Industry Partnership

Region: Baltimore City

Led by Civic Works, the Energy Efficiency Strategic Industry Partnership is providing training to unemployed, underemployed, and incumbent workers. Unemployed and underemployed participants receive relevant technical training and earn certifications including the Department of Energy (DOE) 56-hour Weatherization Installer Fundamentals certification, OSHA 30hour Construction Safety, EPA 8-hour Lead Renovation, Repair, and Painting, and OSHA 4-hour Mold and Asbestos Awareness certification. Incumbent workers receive training in leadership, project management, energy analysis, and sales skills. To date, more than 120 participants have been placed into employment and almost 130 incumbent workers have been trained.

Participant Success Story: Prior to enrolling in the program with Civic Works, KJ felt that he had exhausted his resources looking for employment and had no options that would offer a living wage. A significant barrier that exacerbated the challenges KJ faced was his criminal record, which prevented him from accessing many jobs or receiving consideration during the hiring process. After experiencing multiple setbacks from these barriers, KJ heard about Civic Works and decided to apply for the EESIP Module 1 Training. Through the Module 1 Training Program, KJ gained the crucial skills, certifications, and experience to succeed in the energy efficiency industry. KJ also shared one of the most important things he developed in Civic Works: the soft skills necessary in the workforce, which helped him to retain employment and develop a sense of ownership over his work. The program helped KJ, who had been unemployed for a few years, adjust to consistently being on time and prepared everyday. According to KJ, "Now I feel like I have this sense of pride when it comes to where I work—I feel like I represent more than myself, not only my family, but also the company." Soon after graduating, KJ was hired by ZeroDraft, and currently makes an hourly wage of \$17/hour as a Weatherization Installer.

Manufacturing

Susquehanna Manufacturing Coalition Region: Susquehanna

Led by the Susquehanna Workforce Network, the Susquehanna Manufacturing Coalition continues to meet the needs of its employer partners by providing relevant training opportunities to unemployed, underemployed, and incumbent workers. Employers have identified a need to upskill their current workforce. Additionally, challenges continue around finding skilled individuals for entry-level positions. As such, the partnership is providing Product Production Technician training, which gives students foundational skills. To date, nearly 60 individuals have obtained employment, and more than 50 incumbent workers have received training. The partnership was mostly stagnant in 2020, but looks forward to continuing to meet the needs of manufacturers in the Susquehanna region in 2021.

Careers in Manufacturing Program Region: Baltimore City

Based upon feedback from members of their Industry Advisory Council, Jane Addams Resource Corporation (JARC) continues to provide in-demand training for welding and computer numerical control positions to Baltimore City residents. In addition to technical training, the Careers in Manufacturing Program intensive career readiness and essential skills training and comprehensive wraparound services. JARC was able to transition to virtual learning until July when it was deemed safe to reopen the training center. To date, the partnership has placed over 135 trainees into employment and trained more than 70 incumbent workers.

Participant Success Story: When Demitri came to JARC Baltimore, he was unemployed and homeless. As a trainee at JARC, Demitri took advantage of the many support services JARC had to offer, including financial coaching and essential skills. JARC helped him to obtain insurance, SNAP benefits, and transportation assistance. In February of 2020, Demetri obtained employment as a CNC machinist earning \$14 per hour. Of his experience, he said, "The program is outstanding. If you need any type of assistance, JARC will help you get it. This is a beautiful program."

Manufacturing Bootcamp and Incumbent Worker Training Program Region: Statewide

Led by the Maryland Manufacturing Extension Partnership (MEP), the goal of this project is to help Maryland manufacturers grow their workforce, increase profits and improve processes. In order to accomplish this goal, this partnership has worked with over 100 manufacturers to identify areas of opportunity. Overwhelmingly, employers identify the need to upskill their current workforce. In 2020, Maryland MEP delivered training in topics such as Six Sigma Green Belt, welding, project management, and leadership. Due to COVID-19, there were no Boot Camps in 2020, but the partnership is developing new strategies to build the talent pipeline for manufacturers in 2021.

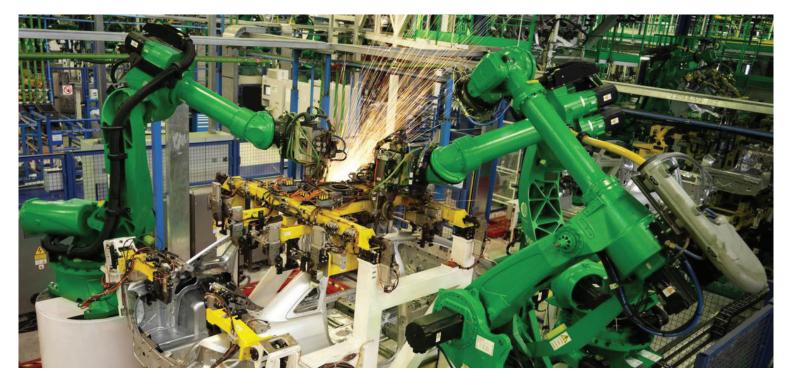
PrintSIP

Region: Statewide

Led by the Printing and Graphics Association MidAtlantic, this partnership is working statewide to meet the needs of one of Maryland's largest industries. PrintSIP is implementing training modules around Graphic Communications, Digital Print Production, Offset Press Operations Binding and Finishing, and Digital File Preparation and Output. To date, more than 100 incumbent workers have participated in training, earning new certifications and skills that will increase their marketability and improve employer outcomes. The partnership was stagnant in 2020 due to COVID-19, but looks forward to resuming training in 2021.

Washington County Manufacturing Partnership Region: Western Maryland

The Maryland MEP continues to engage manufacturers in Western Maryland to meet their workforce needs. Overwhelmingly, employers identify a striking need to upskill their current employees, but find this cost-prohibitive. As such, this partnership is focusing on training incumbent workers. In 2020, training topics included food safety, Lean, Six Sigma Green Belt and Microsoft Office. To date, nearly 600 incumbent workers have received training, leading to increased skillsets and improved business outcomes for employer and industry partners.



Advanced Manufacturing and Plastics Partnership Region: Baltimore

The Maryland Advanced Manufacturing and Plastics Partnership, led by Berry Plastics, continues to work with the Community College of Baltimore County (CCBC) to provide incumbent worker training and pipeline development for new hires. To date, nearly 400 incumbent workers have received training in a variety of different areas, including safety, leadership, hydraulics, pneumatics, injection molding, electricity, and quality. Employers identify an increase in productivity, cost savings and jobs retained, and many participants are earning wage increases as a result of their participation in training. COVID-19 significantly impacted the partnership's ability to provide training opportunities, but there are plans to resume in 2021.

Rapid Advanced Manufacturing Skills Partnership Region: Statewide

In 2020, this partnership was instrumental in helping manufacturers to pivot quickly to manufacture PPE to fight COVID-19. Three companies, Hardwire LLC, Fashions Unlimited, and MD Thermoform received support from the partnership to shift their operations. Other training topics included leadership, Six Sigma Green Belt, and LEAN.

Automated Facilities and Logistics Technician Program Region: Baltimore

This partnership began training in late 2019 and was able to provide training on topics such as basic electricity, microprocessors, and blueprint reading. Despite interruptions due to COVID-19, two cohorts were able to complete training in late 2020.

Construction

Project JumpStart Region: Baltimore City

Project JumpStart, led by the Job Opportunities Task Force, continues to provide pre-apprenticeship training meant to prepare individuals for careers in plumbing, carpentry, and electrical skills. Due to the nature of the training and the necessity of hands-on learning, training was on hold for a majority of 2020. However, in late November, the partnership resumed in-person training, adhering to the safety guidelines from the Center for Disease Control protocol. The cohort, which was suspended in March 2020, graduated in late November. The partnership currently has two active cohorts, scheduled to complete training in early 2021.

Participant Success Story: Ronald, a South Baltimore native and 2017 high school graduate, was unsure of his next step. He enrolled in Project JumpStart in January of 2020. While training was paused due to COVID-19, Ronald was recommended to help partner Associated Builders and Contractors (ABC) move to their new location. During that opportunity, ABC recognized Ronald's work ethic. Despite not having completed training, he was recommended for an interview with a local company. Ronald began employment in September of 2020 and resumed training in October. He graduated with perfect attendance.

Suburban Maryland Construction Initiative Region: Central Maryland

In 2020, this partnership focused on providing vital training opportunities to incumbent workers. The partnership was able to train nearly 120 incumbent workers on the proper and safest way to inspect and use Mobile Elevated Work Platforms. This relevant training included the most up-to-date OSHA regulations and ANSI standards for these machines and ensures contractors and their workers are in compliance. Though the partnership had to pause training due to COVID-19, it is anticipated that at least 50 more incumbent workers will receive training in 2021.

Industry Feedback: "EARN has transformed the way that the Finishing Trades Institute approaches workforce development. There is no doubt that our members are more highly skilled as a result of our participation in the program, helping our contractors to become stronger and more profitable."



Remediation and Construction Industry Partnership

Region: Baltimore City

Given the feedback from its employer partners, the Remediation and Construction Industry Partnership led by Civic Works is providing in demand training to grow the pipeline of qualified workers to be Brownfields Remediation and Stormwater Management Technicians. Participants earn a plethora of certifications including EPA Asbestos Supervisor, Lead Abatement Worker, OSHA 40 Hour Hazardous Site Worker Protection and Emergency Response, OSHA Confined Space Operations, OSHA Bloodborne Pathogens, and OSHA Fall Protection. To date, more than 130 individuals have obtained employment. Despite halting inperson training from mid-March to late-July, this partnership was able to maintain case management and support services. Civic Works continue to partner closely with Baltimore Gas and Electric and is experiencing great success in piloting the region's first utility infrastructure training program.

Participant Success Story: Prior to joining Civic Works, Jim had a long history of employment and worked multiple jobs in the construction sector. However, he faced multiple systemic barriers including homelessness, mental health, child support restrictions, and underemployment. Jim excelled in the Brownfields Remediation and Utility Technician Training Program, and gained industry-recognized certifications, hands-on training, and valuable experience in the industry. In addition to the technical training he received, Jim also found Civic Works' supportive services essential to addressing systemic barriers that impacted his employment prospects. Jim stated, "My case manager helped me with the turmoil I

was dealing with—like helping me get in to see a therapist, anything I needed to do to strengthen me mentally and keep my feet in the right direction." Soon after graduating, Jim was hired by Stella May, where his work ethic and skills have made him stand out in the company. "Jim has excelled at working with others constructively to ensure that he and his team members are safe on the job, and leave at the end of the day as healthy as when they arrived," said his employer.

The Eastern Shore Construction Alliance Spring 2020 graduating class receiving relevant, hands-on training on how to safely utilize tools.

Creating a Pipeline for Green Jobs

Region: Anne Arundel County

Led by Anne Arundel Workforce Development Corporation, Creating a Pipeline of Green Jobs brings together employer partners who seek employees with basic construction skills, essential skills, and some experience and knowledge of the environmental aspects of the industry. The partnership was mostly stagnant in 2020 due to COVID-19, but are currently planning to resume training in 2021.

Participant Success Story: Joan took the Facilities Management Class. After her training, she accepted an on-the-job training opportunity with the Baltimore Country Club. Her supervisor was so impressed with her that she was hired before the on-the-job training was over. Joan had a manufacturing background and had much to learn. She was also a woman in a traditionally male role and the job was very hands-on. However, her penchant for great customer service, positive attitude, and willingness to learn were immediately evident. She flourished in her job and her excellence was noted by both the organization and its members. Her supervisor remarked, "She is such a success story. We all love her so much!"

Marine Trades Industry Partnership

Region: Statewide

The Marine Trades Industry Partnership, (MTAM) continues to work diligently to meet the needs of its more than 80 employer partners. Incumbent worker training remains a high priority for industry partners. To date, more than 200 individuals have received training in a variety of topics, including Yamaha Outboard Repair, Travel Lift and Hydraulic Trailer Operation, and Marine Systems. Additionally, like many of the skilled trades, the marine trades industry is experiencing difficulty recruiting a pipeline of workers to fill the positions of retiring baby boomers. As such, the partnership continues to implement their successful internship program. Students learn technical skills and receive hands-on experience with industry employers. Many interns stay on with employer partners after completion of the internship experience.

Participant Success Story: Despite having a college degree, Lee wanted a career that brought him closer to the water. He applied for and was accepted into the MTAM program. He was placed at Port Annapolis Marina. During his six-week internship, he learned the skills necessary to become a Marine Service Technician. Upon completion of his internship, he was offered and accepted a full-time position at the Port Annapolis Marina.

Eastern Shore Construction Alliance Region: Eastern Shore

The construction industry on the Lower Eastern Shore is poised for growth but hampered by the lack of a skilled workforce. In response to feedback from its eight employer partners, this program provides a comprehensive, holistic curriculum that addresses the multi- faceted challenges to retaining a highly qualified workforce, including specific skills training in carpentry and job readiness skills. Students also partake in hands on projects, including drywall and cabinet installation. To date, 12 individuals are employed. Though COVID-19 hampered training, the partnership resumed training while adhering to strict safety protocols and will continue training in 2021.

Herbert J. Hoelter Vocational Training Center SIP Region: Baltimore City

This partnership addresses the need for vocational training programs for unemployed and underemployed Baltimore City residents. With a focus on serving returning citizens and veterans, the partnership provides three different training tracks: Automotive Repair and Refinish, Commercial Driving, and Heating, Ventilation, Air Conditioning, and Refrigeration (HVAC-R). The 13-week training program includes theory-oriented, hands-on curriculum that provides students will the skills and industry-recognized certifications necessary to thrive in these careers. The program has a 90 percent placement rate.

Participant Success Story: Tyree came to the program with no HVAC knowledge, but possessed a burning passion to learn. The partnership was able to assist with transportation and legal barriers allowing him to fully dedicate himself to training. Soon after graduation, he was placed into employment earning \$19 per hour with health benefits.

GRACE

Region: Baltimore City

Trainees will benefit from a trauma-informed integrated service workforce development delivery model that includes construction skills training and intense supportive and wrap-around services. Participants receive safety training, including First Aid/CPR and OSHA 10. Upon completion, trainees are connected with Registered Apprenticeship opportunities. The pilot cohort successfully completed training, with 100% earning industry-recognized certifications and 80 percent obtaining employment.

Participant Success Story: After spending time in prison, David was eager for a fresh start. He enrolled in the GRACE training program where he was able to earn several industry-recognized certifications highly sought by employers. Upon completion of the program, he was able to obtain employment with a government electrical construction firm currently working on a multi-year contract.

Susquehanna Heating, Ventilation, Air Conditioning and Refrigeration (HVACR) Partnership Region: Susquehanna

Employers in the Susquehanna region report a critical shortage of HVAC-R installation technicians. In response to the lack of skilled workers, this partnership is providing pre-apprenticeship training to unemployed and underemployed individuals. In addition to the fundamental concepts regarding HVAC-R installation, repair, and maintenance, individuals receive supplemental math, reading, comprehension, and essential skills training. Students have completed training and are currently seeking employment opportunities.

Construction Workforce Partnership of Southern Maryland Region: Southern Maryland

This partnership is providing invaluable training that targets unemployed, underemployed, and incumbent workers in the construction industries. Nineteen students have obtained employment, and more than 50 incumbent workers have received safety training. Though job placement has slowed as a result of COVID-19, the partnership will continue to work with students in 2021.

Architectural Metal and Glass Initiative Region: Central Maryland

Despite training being shuttered for a period of time, this partnership was able to provide training to more than 120 incumbent workers in 2020. These individuals gained the education, training, and certifications necessary to maintain employment and remain in compliance with industry standards. Certifications include OSHA-30, MDE EPA Lead 1, and Coating Applicator Specialist. The training received will make contractors more competitive and increase the likelihood of bidding for and winning new projects. The partnership will continue this training in 2021.

Automotive

Automotive Technicians for Change Region: Baltimore

Led by Vehicles for Change, this program is training returning citizens to be automotive technicians. Automotive Technicians for Change, which lasts for up to six months, operates as a simulated work environment and provides hands-on experience and training, preparing interns to earn Automotive Service Excellence (ASE) certifications. The program offers comprehensive barrier removal and essential skills training, which is vital to participant success upon completion of the program. Since program inception, nearly 150 individuals have obtained employment.

Participant Success Story: Tyrone was recommended for the Automotive Technicians for Change program by his instructor at the Occupational Skills Training Center after serving two years on a ten-year sentence for drug distribution charges. Prior

to his incarceration, Tyrone battled homelessness at a young age and navigated the streets until the age of 18, when he decided to sell drugs as he was unable to find employment without an address to list on applications. During training, Tyrone earned seven Automotive Service Excellence (ASE) certifications during one testing period. He also inspired an impromptu challenge among his group, resulting in the entire class earning an average of five ASE's each. One of Tyrone's goals was to pay off old tickets in order to get his license reinstated. He was able to achieve this goal and started a new job with a reputable dealership in Parkville.

Childcare

Montgomery Alliance for Early Childhood Education Region: Montgomery

Employers in the childcare industry report a critical shortage of qualified workers to fill open positions. To address this need, the Montgomery Alliance for Early Childhood Education, led by Montgomery College, is offering courses that lead to Child Development Associate, an industry recognized certification. Job training, English language skills development, basic education, and workforce readiness are part of this structured curriculum. Thirteen students completed training, with ten obtaining employment. Though COVID-19 has hampered the ability for students to earn their credential, Montgomery College will continue to work with these individuals to support this effort in 2021.

UTILIZING DATA

EARN Maryland's workforce training plans are intended to be data-driven to ensure that industry's most immediate workforce needs are met and that its trainees are well-positioned for meaningful employment. The requirements contained within the Solicitation for Implementation Grant Proposals mirror the enabling statute's contingent funding requirements of evidence of workforce shortages and a demonstrated need for worker training. The Solicitation requires that the Workforce Training Plan developed with Implementation Grant funds be both data-driven and experience-driven:

Data-based evidence of shortages in skilled employment within the target industry over a sustained period of time or as projected, based upon planned large-scale programs or large-scale industry changes, and identification of specific high-demand occupations or sets of occupations at different skill and salary levels within the identified target industry.

Real experiences from target industry employers regarding actual and projected gaps in skills training and job readiness. In development of the plan, prospective grantees should focus on ways to obtain input from a broad base of employers in their target industry and region in order to define common workforce needs. Some industries may have more internal data whereas other industries may rely more heavily on the experience of industry partners.

Both qualitative and quantitative measures are important. Strategic Industry Partnerships should take into account both qualitative data provided by the target industry through varied collection methods (interviews, surveys, focus groups, roundtable discussions, etc.) and quantitative Labor market and industry-specific data. Consideration may be given to such issues as understanding high demand occupations in industry, projected job growth by occupation, analysis of gaps between supply and demand of employees, understanding the root causes of these gaps, and characterizing the needed skills to close any gaps.

The two proposals submitted in 2020 as a result of the Solicitation for Implementation Grant Proposals identified the training and skills needs in their Implementation Grant Proposals, based upon a variety of previous or existing workforce studies, plans, or research. A listing of the data sources utilized is provided in Appendix B of this report.

CONCLUSION

As is evident throughout the pages of this report, EARN continued to transform the lives of many Marylanders, despite the COVID-19 pandemic. In the coming year and beyond, as the State continues to recuperate from this unprecedented crisis, industry-led programs, like EARN, will be key in helping businesses to recover, while putting Marylanders back to work.

APPENDIX A

In order to ensure accountability, the Department requires EARN Maryland Partnerships to comply with specific reporting requirements. These measures are meant to track the metrics set forth in the Labor and Employment Article § 11-709(b)(4) of the Maryland Annotated Code. Statutorily required data is presented below. The data below covers the time period July 1, 2019 through June 30, 2020.

By Sex

Sex	# of Participants	Percentage of Whole
Male	2,734	60%
Female	1,763	39%
Not specified	38	1%

By Race

Race	# of Participants	Percentage of Whole
White	1,584	35%
Black/African American	2,159	48%
Asian	212	5%
Native American/American Indian	14	<1%
Hawaiian/Pacific Islander	9	<1%
Hispanic/Latino	274	6%
Two or More Races	110	2%
Other	47	1%
Not Specified	126	3%

By Income

Income Level	# of Participants	Percentage of Whole
Less than \$10,000	1,737	38%
\$10,000 to \$14,999	214	5%
\$15,000 to \$24,999	444	10%
\$25,000 to \$34,999	422	9%
\$35,000 to \$49,999	425	9%
\$50,000 to \$74,999	638	14%
\$75,000 to \$99,999	259	6%
\$100,000 to \$149,999	159	4%
\$150,000 to \$199,999	40	1%
\$200,000 or more	8	<1%
Unreported or Incalculable	189	4%

By National Origin

National Origin	# of Participants	Percentage of Whole
American	3,400	75%
North American (excluding USA)	43	1%
Central and Latin America	117	3%
European	93	2%
African	295	7%
Middle Eastern	34	1%
Asian	146	3%
Oceania	9	<1%
Two or More Identified	8	<1%
Other	41	1%
Not reported	349	8%

By County of Residence

County of Residence	# of Participants	Percentage of Whole
Allegany County	114	2.5%
Anne Arundel County	194	4.3%
Baltimore City	1,295	28.6%
Baltimore County	493	10.9%
Calvert County	25	0.6%
Caroline County	17	0.4%
Carroll County	45	1%
Cecil County	65	1.4%
Charles County	89	2.0%
Dorchester County	9	0.2%
Frederick County	448	9.9%
Garrett County	7	0.2%
Harford County	106	2.3%
Howard County	139	3.1%
Kent County	6	0.1%
Montgomery County	492	10.8%
Prince George's County	351	7.7%
Queen Anne's County	18	0.4%
Somerset County	13	0.3%
St. Mary's County	48	1.1%
Talbot County	13	0.3%
Washington County	117	2.6%
Wicomico County	58	1.3%
Worcester County	50	1.1%
Outside of Maryland	142	3.1%

County of Residence	# of Participants	Percentage of Whole
Not reported	168	3.7%

By Educational Attainment

Education Level	# of Participants	Percentage of Whole
Some High School or Less	176	4%
High School Diploma/GED/ Equivalent	1,632	36%
Some College	887	20%
Associate's Degree	284	6%
Bachelor's Degree	910	20%
Advanced Degree (Master's, PhD, other)	339	7%
Trade School	81	2%
Other/Undisclosed	226	5%

Credential or Certification - 1,906

Identifiable Skill - 2,696

A new Employment Position - 802

A Title Promotion - 253

A Wage Promotion – 1,128

APPENDIX B

As referenced above, EARN Maryland partnerships must develop Workforce Training Plans that are data-driven.

The following is a listing of data sources used by Strategic Industry Partnerships who applied in response to the Clean Energy Solicitation.

Unknown (2020, September 1) Job Posting Analytics-Glazing-Emsi Q3 2020 Data Set September 2020, Retrieved from: https://a.economicmodeling.com/analyst/

Unknown (2020, February) Flat Glass Market Size Worth \$202.9 Billion By 2027 | CAGR: 7.3%, Retreived from: https://www.grandviewresearch.com/press-release/flat-glass-market

Unknown (2020, September 1) Industry Snapshot-Glazing-Emsi Q3 2020 Data Set September 2020, Retrieved from: https://a.economicmodeling.com/analyst/

Unknown (2020, September) Baltimore County Census Data, Retrieved from: https://www.census.gov/quickfacts/baltimorecountymaryland

Zhao, N (2019, September 19) Age Distribution of the Construction Labor Force, Retrieved from: http://eyeonhousing.org/2019/09/age-distribution-of-the-construction-labor-force/

Unknown (2020, September) Details Report for: 47-2121.00 - Glaziers Retrieved from https://www.onetonline.org/link/details/47-2121.00

Hawkins, J (2020, September) About Emsi's Data-Emsi's Labor Market Data (LMI) retrieved from: http://www.eco-nomicmodeling.com/data-sources/

Unknown (2020, September) LEED Window Standard Retrieved from: https://www.usgbc.org/credits/homes/v4-draft/eac9

Unknown (2020, September) Industry Snapshot Construction in Baltimore-Columbia-Towson, MD Retrieved from: https://a.economicmodeling.com/analyst/?t=35thv#h=QQbZq&page=industry_report