

# Workforce Innovation and Opportunity Act Annual Statewide Performance Report Narrative for Titles I and III

**Program Year 2022** 

## **Table of Contents**

Introduction	3
Waiver: Individual Training Account for In-School Youth	3
Preparing Job Seekers for Success	4
Performance Indicator: Effectiveness in Serving Employers	5
Statewide Activities	6
Customer Satisfaction	13
Data Validation	15
Research and Evaluation: Effectiveness of Training Programs on Participant Employment and Wage Outcomes	17
Appendix A: Research and Evaluation	24
Appendix B: Local Area Initiatives and Success Stories	28
Appendix C: Arizona Economic Analysis	33

In Program Year (PY) 2022, the ARIZONA@WORK public workforce system continued delivering impactful services to job seekers and employers, aligned with the purposes of the Workforce Innovation and Opportunity Act (WIOA). The programs authorized under Title I of WIOA and the Wagner-Peyser Act, as amended by Title III of WIOA, served and connected individuals, especially those with barriers to employment, with career, training, and supportive services to help them succeed in the labor market. The programs also supported and strengthened business sectors across Arizona.

This narrative, which was developed with the assistance of Titles II and IV partners, highlights the services that supported job seekers and employers – from Individual Training Accounts (ITAs) for in-school youth, career services for justice-involved individuals, to career pathways available through Registered Apprenticeships. The narrative also identifies statewide initiatives and projects. Lastly, it describes activities that supported the State's performance accountability system and continuous improvement through research and evaluation.

## **Waiver: Individual Training Account for In-School Youth**

In PY 2022, 89 training services funded by ITAs were delivered to 81 in-school youth participants. Of those participants impacting PY 2022 WIOA performance indicators, in-school youth who received training via ITA were more likely to have successful placement in the second quarter after exit, attained a credential, and achieved a measurable skill gain, as illustrated in Table 1.

Table 1: Performance Outcomes for In-School Youth with ITA (PY 2022)

Indicator	In School Youth Training	n with ITA funde	ed	In School Youth Total				
muicatoi	Numerator: Achieved a Positive Outcome  Denominator: Qualified to Achieve a Positive Outcome		Rate	Numerator: Achieved a Positive Outcome	Denominator : Qualified to Achieve a Positive Outcome	Rate		
2nd Quarter Employment Rate	53	66	80.3 %	218	294	74.1 %		
Credential Attainment Rate	18	20	90.0 %	123	219	56.2 %		
Measurable Skill Gains Rate	39	52	75.0 %	252	396	63.6 %		

The overall Youth program credential rate decreased from PY 2021 (60.3 percent) to PY 2022 (59.0 percent). The total number of in-school youth participants receiving training services has increased every year that the waiver has been in place, from 112 to 167 to 175 in PY 2020, PY 2021, and PY 2022, respectively.

The impacts of the waiver on WIOA performance indicators appear promising for PY 2022, continuing a trend seen in PY 2021 data. The waiver was approved in late 2019, with 2020 being the first full Calendar Year (CY) ITA funding was accessible to participants. While some cohort sizes remain low, they are increasing as more exiters will have benefited from the waiver over time. The impacts of the ITA for in-school youth waiver will continue to become clearer in future PYs as the cohort sample sizes increase.

## **Preparing Job Seekers for Success**

As the economic analysis demonstrates (see Appendix C), unemployment rates returned to low levels following the pandemic. In stronger economies, the populations seeking workforce services may contain higher proportions of individuals with barriers to employment. Accordingly, Titles I and III programs continue to focus on serving individuals with barriers to employment and to collaborate with ARIZONA@WORK partner programs to help individuals overcome those barriers.

Table 2: WIOA Titles I and III Performance (PY 2022)

WIOA Performance Indicator		Adult Program	Dislocated Worker Program	Youth Program	Wagner- Peyser Employment Service
Employment Rate,	Target	69.9%	78.0%	74.0%	68.0%
2nd Quarter after Exit	Actual	72.1%	75.9%	76.0%	61.3%
Employment Rate, 4th Quarter after Exit	Target	67.5%	75.0%	70.0%	63.0%
	Actual	66.5%	71.3%	74.5%	54.5%
Median Earnings,	Target	\$6,785	\$8,646	\$5,044	\$5,900
2nd Quarter after Exit	Actual	\$8,681	\$9,099	\$6,278	\$7,854
Credential Attainment	Target	78.0%	74.5%	61.0%	
Creuential Attailinent	Actual	71.3%	71.8%	58.7%	
Measurable Skill Gains	Target	65.0%	69.0%	62.0%	
Weasurable Skill Gallis	Actual	74.9%	82.3%	66.9%	

The PY 2022 4th Quarter Employment Rate included a higher proportion of individuals identified as justice-involved (+20.8 percent) and long-term unemployed (+21.2 percent) than the respective combined proportions of previous three PYs. Significantly,

individuals in these two employment barrier categories performed below the overall 4th Quarter Employment Rate in PY2022 (35.5 percent and 38.8 percent respectively) and PY 2019-2021 Combined (50.1 percent and 45.8 percent respectively).

As part of the WIOA State Plan development, ARIZONA@WORK partners and stakeholders will be gathering to discuss the economic and workforce data and its impacts on service delivery. Information gathered will guide goal and strategy development for PY 2024-2028.

Local Workforce Development Area success stories and initiatives are provided in Appendix B.

## **Performance Indicator: Effectiveness in Serving Employers**

In PY 2022, 57.36 percent of Titles I and III exited participants retained employment with the same employer.

Table 5: Participant Retention with the Same Employer - 2nd and 4th Quarters After Exit

Participants who retained employment with the same employer - 2nd and 4th quarters after exit (numerator)	12, 244	<b>57</b> 200/
Participants who were employed in their 2nd quarter after exit (denominator)	21,346	57.36%

Arizona chose connecting with employers to measure effectiveness in serving employers, which is inclusive of the following broad categories:

- Consultations and work site visits:
- Customized interaction with a specific employer or industry group;
- Talent matching:
- Recruitment events; and
- Pre-employment screening.

Connecting with employers is tracked by aggregating the following business services: consultations, job order entry, comprehensive job order review, advanced search, hiring/job fair/resource event, customized labor market information, system of record navigational assistance and account reactivation, work experience, and Rapid Response assistance.

In PY 2022, local and state business services team members delivered over 16,000 employer services, an average of 1,400 services a month. The largest service components included over 2,900 consultations, over 1,100 employers participated in

hiring events, and just under 2,000 employer accounts were approved.

#### **Statewide Activities**

This section highlights two statewide programs that support career pathways, in addition to statewide initiatives and projects made possible with WIOA funds.

### Arizona Registered Apprenticeship Program

The Arizona Apprenticeship Office (AAO) continues to support local employers and industries to develop a highly skilled workforce and help individuals secure meaningful employment and promising career pathways. In PY 2022, AAO saw a 36 percent increase in apprenticeship enrollments, with 3,483 new registered apprentices, compared to 2,563 new apprentices in PY 2021.

As of June 30, 2023, there were 5,918 registered apprentices in Arizona, compared to 4,502 registered apprentices at the end of PY 2021, an increase of 31 percent.

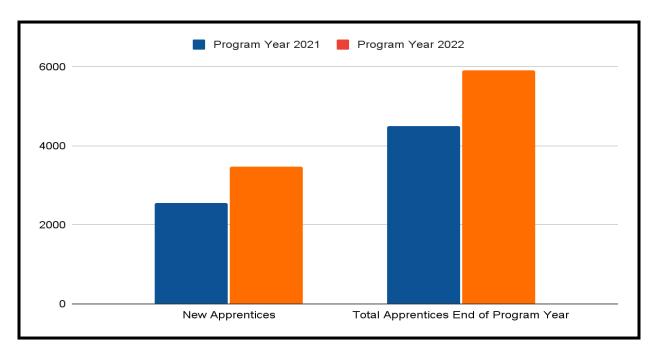


Figure 1: New Apprentices and Total Apprentices for PYs 2021 and 2022

In PY 2022, 40 new Registered Apprenticeship Programs (RAPs) were established, bringing the total RAPs to 245. The RAPs offer opportunities in various career paths and industry sectors, including:

- Construction;
- Healthcare:
- Childcare;
- Manufacturing;

- Information Technology;
- Transportation;
- Aviation; and
- Public Administration.

Twenty-nine percent (71 RAPs) are included on the State's Eligible Training Provider List (ETPL). A total of 532 individuals whose RAPs are on the ETPL completed their apprenticeship in PY 2022.

AAO has continued to engage populations who have been historically underrepresented in RAPs. Consequently, women have an 11.6 percent participation rate in PY 2022, an increase of 1.5 percent from the previous year. Individuals with disabilities in Arizona have a 2.2 percent participation rate, compared to the national average of 1 percent<sup>1</sup>.

AAO continues to partner with local educational institutions to create skilled workforce pipelines. The partnership has resulted in the integration of the apprenticeship model into the educational institutions' curricula, with input from Arizona employers, thereby meeting the training needs of apprentices and the workforce needs of employers in the State. Serving as RAP intermediary sponsors, institutions such as Arizona Western College and Central Arizona College, serve as the related technical instruction provider and also the administrator of the program for a range of occupations for various employers and industries in their regions.

AAO is also aligning Career and Technical Education (CTE) Programs with RAPs through pre-apprenticeships and youth apprenticeships. Both CTE and RAP standards are vetted and approved by industries. The alignment develops labor participants who are knowledgeable about the industry, potentially leading to a more successful outcome than for those without pre-apprenticeship opportunities.

AAO continues to engage the healthcare and education industries, while expanding into advanced manufacturing and semiconductor industries. AAO joined forces with national industry intermediaries to organize apprenticeship accelerator events. These events, designed to educate, raise awareness, and offer support for registered apprenticeships, have garnered significant interest and engagement from employers within those industries. Over 300 employers, industry associations, education providers, and workforce representatives throughout the state attended the accelerator events in person and virtually. From these events, AAO has engaged over 50 employers and associations on establishing RAPs.

The BuilditAZ Apprenticeship Initiative<sup>2</sup> complements and underscores AAO's mission to help develop a highly skilled workforce for employers and make quality employment available to workers and job seekers. The BuilditAZ Apprenticeship Initiative goals include:

https://arizonaatwork.com/sites/default/files/2023-08/BuilditAZ-Apprenticeship-Initiative.pdf

<sup>&</sup>lt;sup>1</sup> Source: Apprenticeship USA Data and Statistics https://www.apprenticeship.gov/data-and-statistics

<sup>&</sup>lt;sup>2</sup> BuilditAZ Apprenticeship Initiative

- Double the number of construction and trades registered apprentices in Arizona by the end of 2026;
- Increased access to effective pre-apprenticeship programs that directly enroll in RAPs, creating pathways in the trades, especially for women and other underrepresented learners;
- Updated registered programs' rules and regulations to reflect current market trends and best practices;
- Creation of an apprenticeship grants office to secure funding that expands apprenticeship programs, and direct agencies for the first time to actively apply for federal apprenticeship funds;
- Increased funding and development of strategies for meeting increasing green economy workforce demands and filling green jobs, for projects such as EV charging stations and solar panel installation; and
- Increased number of adults in Arizona with an industry-recognized credential, contributing towards meeting the state's attainment goal, Achieve60AZ (60 percent education attainment by 2030).

#### Statewide Rapid Response

While Arizona Department of Economic Security (ADES/Department) administers Rapid Response at the State level, it partners and coordinates Rapid Response activities with affected Local Workforce Development Areas (LWDA). In PY 2022, Arizona received 37 Worker Adjustment and Retraining Notification (WARN) Act notices. State and local Rapid Response teams collaborated with 16 employers who filed WARN Act notices to provide services to dislocated workers. In total, 5,161 workers were affected by facility closures and mass layoffs, with 176 workers receiving Rapid Response services.

ADES offered Work-Based Learning (WBL) expansion funding opportunities to LWDAs beginning March 1, 2023. Two LWDAs were awarded funds to create, expand, and manage WBL Programs to support communities impacted by mass layoffs, business closures, natural disasters, or demographic shifts.

### Statewide Initiatives and Projects

The following projects and initiatives are led by the Office of Economic Opportunity (OEO) with the exception of the WIOA Governor's Discretionary Fund Grant which was issued by the Governor's Office of Youth, Faith and Family.

#### Arizona Career Readiness Credential

The Arizona Career Readiness Credential (ACRC) Program, a Statewide initiative implemented until August 2023, served job seekers and employers alike. ACRC's career readiness modules and assessments equipped job seekers, including youth, with foundational skills to help them thrive in the workplace. ACRC modules were also used

in high schools throughout the State as well as the Title II Adult Education Program as follows:

- Part of the <u>HSE<sup>3</sup> Plus Career-Readiness</u> pathway to a high-school equivalency diploma; and
- Workplace preparation, particularly in Integrated Education and Training Programs.

ACRC benefitted employers by validating that job candidates possessed key academic and technical knowledge, as well as the necessary interpersonal and professional skills they seek.

In PY 2022, the ACRC Program launched a groundbreaking new component, digital literacy basics. The purpose of digital literacy basics was to forge in job seekers and employees a foundational understanding of the various types of digital devices and operating systems needed to be successful and productive in the workplace. Digital literacy basics was comprised of a proctored assessment and accompanying skill development courseware, which focused on the following technological skills:

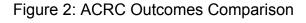
- Computer basics;
- Internet basics:
- Digital communication basics;
- Digital document basics; and
- Security basics.

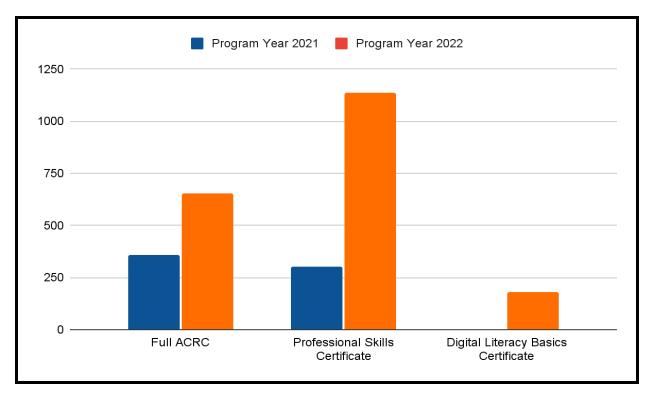
ACRC participation and outcomes data increased from PY 2021 to PY 2022, as shown in Figures 2 and 3. F

In total, 656 individuals earned the full ACRC, which required the completion of four assessments: work-ready math, work-ready reading, work-ready data, and professional skills. A total of 1,139 individuals earned the professional skills certificate, and 179 earned the digital literacy basics certificate. The certificates were awarded after the completion of the specific assessment.

-

<sup>&</sup>lt;sup>3</sup> High School Equivalency





There were 4,141 new enrollments for the ACRC Program. Participating job seekers logged a total of 22,287 hours in ACRC's Learning and Testing Portal. A total of 14,105 eBadges were earned, which signify skills development and learning progress.

25000
20000
15000
New Enrollments eBadges Total Hours

Figure 3: ACRC Participation Data

## Arizona Western College Broadband Project

The Arizona Western College Broadband Project is a \$300,000 project that implements a broadband fiber optics training program at Arizona Western College, with a focus on related in-demand jobs in Yuma County. The program includes Fiber Optic Certification tuition assistance, paid work-based training, job placement assistance, and supportive services. The project serves local employers such as Arizona Public Service, Spectrum, ALLO Fiber Internet, Century Line and others.

## Future 48 Advanced Manufacturing Marketing Campaign

Future48 is a \$300,000 marketing campaign through Ideas Collide to change perceptions in the advanced manufacturing trades industry as a Science, Technology, Engineering, and Mathematics (STEM)<sup>4</sup>-based career pathway in order to capture a diverse and emerging workforce. The campaign will create a wide variety of digital, print, and other forms of media that will guide interested individuals to a website for additional information on advanced manufacturing.

<sup>4</sup> Science, technology, engineering, and math

11

#### ElevateEdAZ

OEO and Arizona Commerce Authority are funding a \$5,000,000 project for the Phoenix Chamber Foundation to expand its ElevateEdAZ Program. The program prepares individuals for college and career through stronger alignment between education, business and the community. ElevateEdAZ Program is focused on increasing the number of students completing high-quality education to workforce learning pathways that align with the needs of the industry. This includes working with school partners to support students in completing industry recognized credentials, attaining early post-secondary credit and participating in WBL experiences such as internships and job shadowing. In addition, ElevateEdAZ supports educator professional development by partnering to provide externship experiences for teachers and counselors.

# Maricopa County Community College District Semiconductor Technician Quick Start Program

Maricopa County Community College District received \$2.5 million to develop a training program for semiconductor manufacturing technician jobs. The short-term training program is a collaboration with semiconductor companies in the area and is intended to qualify individuals for an exciting new career and full-time employment as semiconductor manufacturing technicians.

#### <u>Career and Technical Education Programs</u>

West-MEC, an Adult Education partner, received \$580,000 to create two new high school CTE Programs in the semiconductor and electric vehicle technology industries. The majority of the funds will be used to purchase equipment, supplies and materials at three different campuses in the West Valley.

#### Jobpath Inc. Student Support Services

Jobpath Inc. received \$210,000 to support the success of 547 low-income students pursuing short-term degrees or credentials throughout southeastern Arizona.

## SciTech EcoSystem Hubs Project

Arizona SciTech received \$142,000 to forge a network of regional STEM communities of practice or "hubs" in the State. The hubs allow individuals in their regions to connect and engage local educational, civic, and community institutions; people and assets; ARIZONA@WORK; other regional workforce organizations; and employers.

The network of hubs will ensure that workforce efforts reach youth and untapped, underserved populations (e.g., minorities, rural residents, veterans, etc.) to catalyze a diverse pipeline of skilled, knowledgeable Arizonans entering the workforce. Hub members will also connect as a statewide community of practice to share best practices, build partnerships, and develop communication strategies to increase impact

#### Workforce Innovation and Opportunity Act Governor's Discretionary Fund

In the last quarter of PY 2022, the Governor's office requested grant applications for innovative workforce development pilot programs that engage individuals from communities with consistently high rates of unemployment and poverty. Approximately \$4,000,000 would be awarded, with a maximum annual award of \$500,000 per grantee, which is renewable for a combined term of three years. Applications from Arizona entities that include 501(c)(3) organizations; Arizona local, county, and state government entities; Arizona Tribal Nations and communities; Arizona public and charter school districts; Arizona institutions of higher learning (universities, community colleges, and trade schools); and any partnership of the above-listed organizations were accepted.

To increase participant accessibility and eliminate barriers to success, proposed programs are required to provide wraparound services during program enrollment and at least six to twelve months post-graduation. Examples of wraparound services include but are not limited to the following:

- Mentoring;
- Trauma-informed care:
- Personal employment counseling;
- Employment readiness;
- Childcare;
- Transportation support;
- Nutrition assistance; and
- Transitional housing.

Furthermore, programs should strive to implement programming in the communities they seek to serve and will need to demonstrate existing partnerships with the public workforce development system, education and human services systems and private establishments.

#### **Customer Satisfaction**

The State continues to measure customer satisfaction through surveys that prompt job seekers and employers to rate and provide feedback on services they received.

## Statewide Job Seeker Satisfaction Outreach Methodology

The State surveyed job seekers who exited Titles I and III Programs, between January and December 2022. The surveys, which were conducted by phone or sent through email, gauged the following:

- The job seeker's overall satisfaction with services;
- Whether services met job seeker expectations; and
- How services compare to the job seeker's ideal set of skills.

Seventy individuals were surveyed, and 55 (79 percent) responded to the survey. The survey yielded an 85 percent satisfaction rate, which is the weighted average of the satisfaction rate for each of the three criteria identified above.

Eighty-seven percent of survey respondents expressed overall satisfaction with the services they received. Eighty-three percent indicated that the services met their expectations, while 86 percent agreed that the services matched their skill set.

Table 2: Job Seeker Survey Results

Number of Completed Surveys	Number of Job Seekers Eligible for the Survey	Number of Job Seekers Included in the Sample	Response Rate	Satisfaction Score
55	4133	70	79%	85%

Table 3: Survey Criteria Breakdown

Overall Satisfaction with Services	Services Met Expectations	Services Matched Skill Set
87%	83%	86%

#### Statewide Employer Satisfaction Outreach Methodology

In previous PYs, the State asked employers to rate their satisfaction based on the following criteria:

- Overall satisfaction with services;
- Whether services met their expectations;
- How services compare to the person's ideal set of skills; and
- Whether ARIZONA@WORK assisted the employer in identifying qualified job applicants.

In PY 2022, to better understand the impact of its employer services, the State revised the employer questionnaire to the following:

- Did ARIZONA@WORK assist the employer in identifying qualified job applicants?
- Did the employer find value in the services it received from ARIZONA@WORK?
- Is the employer likely to use ARIZONA@WORK again?

The survey with the new questionnaire was sent to 256 employers by email. Sixty-seven employers (26 percent) responded, with the answers broken down as follows:

Table 4: Employer Survey Results

	ARIZONA@WORK helped to identify qualified job applicants	Found value in ARIZONA@WORK services	Likely to use ARIZONA@WORK again		
Yes	27	54	62		
res	40%	81%	93%		
No	40	13	5		
No	60%	19%	7%		

#### Local Area Customer Satisfaction Outreach

Local areas also assess job-seeker and employer satisfaction with local ARIZONA@WORK services through surveys. Each local area has a unique approach to delivering the surveys, including the following:

- A five-question survey to job seekers, delivered in person or by phone, seeking feedback at various stages of participation in any of the Title I core programs;
- Exit surveys for job seekers who visit ARIZONA@WORK offices in various local areas, including those that are collected through a drop box;
- Survey delivered to employers after job or education fairs;
- Biannual surveys to employers whom the local has served; and
- Employer surveys conducted during On-the-Job Training (OJT), incumbent worker training, or work experience.

#### <u>Customer Satisfaction and Continuous Improvement</u>

State Employment Service staff and local area service providers continue to use customer feedback and survey ratings to improve job-seeker and employer experience with ARIZONA@WORK. Customer satisfaction is used as a tool to facilitate constructive dialogue around providing outstanding client experience and making the appropriate changes to better serve the workforce system's customers.

#### **Data Validation**

#### Frequency of Data Validation

In PY 2022, ADES continued to conduct data validation of participant records quarterly, beginning on the first business day of each quarter.

Validators with the Quality Assurance and Integrity Administration (QAIA) at ADES review participant records in the Title I Adult, Dislocated Worker, and Youth programs; Title III Wagner-Peyser Act Employment Service program, including Migrant Seasonal Farmworker records; Jobs for Veterans State Grant Program; and Trade Adjustment Assistance Program.

#### Participant Record Sampling Methodology

On the first business day of the quarter, the ADES Workforce Information Technology unit generates files on individual programs to be reviewed. The file for each program includes participants from the 12 local areas who are in the performance reporting cohort for the quarter. For reference, the file also identifies the sample size or the number of participant records that needs to be validated based on the total number of records in the file, with a 95 percent confidence level and confidence interval of five.<sup>5</sup>

Notwithstanding the recommended sample size identified in the file and due to unit capacity, the validators' unit supervisor randomly selects participant records for data validation from the Adult, Dislocated Worker, and Youth files as follows: five participant records from each program, per local area, for a total of 15 participant records for each local area. If there are less than five participant records in a given program in a local area, all participant records identified in the program file for that local area will be reviewed.

From the Employment Service Program file, the validators' unit supervisor randomly selects for data validation a combination of active and exited participant records from 33 ARIZONA@WORK job centers. Although the files from which the participant records are selected are generated quarterly, on average, 80 active and exited participant records are validated each month, totaling an average of 960 validated participant records a year.

Prior to each quarter's review, the validators will compare the local area's or job center's previous quarter's participant record selection to prevent duplication of participant record review.

## Remediating Data Validation Findings

For the Title I Programs, QAIA gives each local area ten business days from the date of the data validation report to respond to the findings and take appropriate corrective

<sup>&</sup>lt;sup>5</sup> Based on the Creative Research Systems Sample Size Calculator

steps, such as uploading missing source documentation in the State's system of record.

If a local area does not respond in ten business days, QAIA issues a second letter to the local area, requesting a response and/or corrective action within an additional ten business days.

Once the local area has resolved the findings and upon validator verification, QAIA closes the data validation for the local area for the quarter. The closure is documented by a letter to the Local Workforce Development Board chair and director, confirming the end of data validation for the quarter.

#### Error Rates Threshold and Corrective Action

Local areas must address all findings identified during data validation of Title I Programs. However, if ADES determines that a local area has a consistent pattern of error rates that are at or more than two percent per participant record by LWDA per quarter per PY, the Department will require additional corrective action, as noted in the State's <u>substantial violation and sanctions policy</u>.

The two percent threshold is determined by not meeting an accuracy rate of 98 percent, quarter after quarter, within the PY.

#### <u>Data Validation Training and Technical Assistance</u>

Annual data validation training for the Adult, Dislocated and Youth Programs is a collaborative activity among ADES units, including QAIA, Policy, Program Oversight and Support, and Workforce Information Technology, and local area partners. The training serves as a refresher on policy and procedures and common errors identified during data validation. ADES also provides targeted technical assistance to local area service providers, as needed.

#### **Data Validation Record Retention**

QAIA maintains all data validation reports (including data validation worksheet, summary of report, source documentation, and participant files requested) electronically in a shared drive and are organized according to local area.

All records pertaining to the data validation and monitoring review are maintained pursuant to 29 CFR § 97.42 and maintained for a period of three years in accordance with the state disposition schedule.

# Research and Evaluation: Effectiveness of Training Programs on Participant Employment and Wage Outcomes

While training programs have the potential to provide ARIZONA@WORK participants with the opportunity to gain the knowledge and skills required to be competitive in the job market, quantifying the specific impact these training programs have on the employment and wage outcomes of ARIZONA@WORK participants has been challenging. Externalities such as participant characteristics, barriers to employment and current economic conditions make an "apples-to-apples" comparison of training program effectiveness nearly impossible.

The objective of this study is to establish a process to objectively evaluate the effectiveness of training programs offered by training providers in the ARIZONA@WORK system by quantifying the effects of external factors outside the control of the training providers, and removing them from consideration. The analysis provided in this study can help workforce policy makers adopt training program strategies that align with the goals of the ARIZONA@WORK system: promoting resources that lead participants to meaningful employment with livable wages.

#### Overview

The study included 22,294 adult participants who exited the workforce system between 2018 Q1. and 2021 Q1. Among these participants, 5,182 participants completed at least one occupational skill training, while the remaining 17,112 participants either did not enter a training, or entered a training but did not complete it. The study only evaluated programs with greater or equal to five training completers. There were a total of 70 training providers and 104 training programs that met the minimum participant "completer" requirements and were included in the study. The remaining 127 training providers and 405 training programs did not meet the minimum participant completer threshold and were excluded from the study.

#### Other considerations were as follows:

- The study treated the non-completers as a baseline group and compared this group's outcomes to the outcomes of training completers in each of the ten education subjects.
- If a participant completed more than one training program, only the last completed training was considered.
- The study evaluated employment and wage outcomes for those participants who
  completed a training program in the other occupational skills training service type
  category. Note, other occupation training service is an official training type
  category defined under WIOA as training that combines workplace training with
  related instruction or skill upgrading and retraining.

#### **Evaluation Method**

The study used two methods to estimate the employment and wage effects of training programs. The first, referred to as the training subject effect, estimated the effect training programs had on employment and wage outcomes based on the educational subject of the training program completed. Training programs were organized into ten subject categories, which are listed in Table 1 in Appendix A. The second method, referred to as the training program effect, estimated the effect training programs had on employment and wage outcomes. This method also identified differences in effectiveness for similar training programs offered by multiple training providers.

The study reviewed participant performance across three outcome measures to determine training program effectiveness. These measures included employment rate two quarters after exit, employment rate four quarters after exit, and the average quarterly wage received two quarters after exit. Individual participant outcomes were aggregated by training program education subject and training program provider for evaluation.

#### Predicting Participant Employment and Wage Outcomes

The Statistical Adjustment Model for Training Programs (the model) generated predictive performance outcomes for each participant who completed a training program based on that participant's demographic and economic characteristics. The model evaluated participant employment and wage outcomes by training program, while considering the characteristics of the participants served. It identified and managed factors outside the control of training providers to ensure predicted employment and wage outcomes appropriately reflected the participants being served. This meant that training providers who, on average, served a harder-to-serve population, would have lower predicted employment and wage outcomes than training providers who served an easier-to-serve population. External factors include barriers to employment as defined under WIOA along with other characteristics such as previous employment, education level, age, etc.

Once a training program's projected employment and wage outcomes were estimated, based on the characteristics of the participants served, they were compared to the actual employment and wage outcomes of the participants served. A training program was determined to be effective if participants who completed a training program had higher performance outcomes than the predicted employment and wage lower bound estimate calculated by the 95 percent confidence interval of the model. Detailed methodology for setting the expected performance outcomes can be found in Methodology for ARIZONA@WORK Training Program Effectiveness Evaluation Project.

<u>Evaluation Method 1: Training Program Effect on Participant Employment and Wage Outcomes by Training Subject</u>

To evaluate the effectiveness of the ten training subjects, OEO applied a linear

regression model and treated training subject groups as categorical variables. Based on the definition of a linear regression model, the model coefficients for each subject group reflect the differences in employment and wage outcomes between the training subject groups and non-completers. The coefficients estimated for each training subject quantify the effectiveness of each compared to the estimated outcomes of non-completers.

There were a total of 104 training programs that met the minimum participant completer requirements included in the study. Figure 1 shows the total number of programs by training subject. The Health Professions training subject had the largest number of training providers, accounting for 52 percent of all programs. The Transportation and Materials Moving training subject had the second largest number of training providers, accounting for 14 percent of all programs. Figure 2 in Appendix A shows the total number of completers by training subject. The training subject category with the largest number of completers was the Transportation and Materials Moving Program followed by the Health Professions and Related Program.

#### Results

Table 2 shows the effects of the ten training subjects on participant employment 2nd quarter after exit, employment 4th quarter after exit, and wages 2nd quarter after exit, as well as the baseline effect of training on non-completers for comparison purposes. A training subject with a positive program effect indicates that participants who completed a training program in that training subject category had better outcomes than non-completers. Eight out of ten training subject categories had positive effects on participant employment and wage outcomes. Training programs in the Health Professions and Related Programs category were the most effective in improving participant employment outcomes two and four quarters after exit. Training programs in the Homeland Security, Law Enforcement, Firefighting and Related Protective Services category were the most effective in improving participant wages two quarters after exit.

A training subject with a negative program effect indicates participants who completed a training program in that training subject category had worse outcomes than non-completers. Two training subjects, Culinary, Entertainment, and Personal Services and Legal Professions and Studies, had negative program effects on participant employment and wage outcomes. Training programs in the Culinary, Entertainment, and Personal Services category were the least effective in improving participant employment outcomes two quarters after exit. Training programs in the Legal Professions and Studies category were the least effective in improving participant employment four quarters after exit and wages two quarters after exit.

<u>Evaluation Method 2: Training Program Effect on Participant Employment and Wage Outcomes by Training Program Provider and Training Program Subject</u>

In the ARIZONA@WORK system, there are instances where a specific training program is offered by several different training providers. In these cases, participants need to

decide which training provider will offer the best training that will allow them to be as competitive as possible when entering the job market. This may prove difficult, even if participants could review the outcome metrics of previous participants, given the differences in characteristics of past participants. To help identify the effectiveness of specific training programs offered by different training providers, the study evaluated participant employment and wage outcomes by training program provider and training program.

Figure 3 summarizes the number of training programs by training subject. The training subject with the largest number of programs was the Health Professions and Related Programs subject, with 47 programs representing 59 percent of total programs. For each training provider and training course, the study compared actual employment and wage outcomes of participants to the predicted employment and wage outcomes. Predicted employment and wage outcomes were calculated using the demographic characteristics of the participants served and the subject of the training provided.

The training subject effect on employment and wage outcomes that was calculated in the previous section of this study was considered for training programs with a positive training subject effect, but was not considered for training programs with a negative training subject effect. This ensured that the model would not unfairly adjust the predicted outcomes for training programs with a negative training subject downward to account for the known negative training subject effects of those programs.

#### Outcome Measure Ratings

A scoring system based on actual and predicted participant outcomes was developed to help workforce practitioners and job seekers identify effective, adequate and ineffective training programs. Training programs were assigned an effectiveness rating based on the actual and predicted outcomes of the participants who completed them. For each of the three outcome measures considered, training programs were assigned a rating from one to three, three representing the best rating.

The ratings were assigned as follows:

- Rating 1: The actual outcomes for participants who completed a training program were worse than the predicted lower-bound outcomes.
- Rating 2: The actual outcomes for participants who completed a training program were better than the predicted lower-bound outcomes, but worse than the predicted upper-bound outcomes.
- Rating 3: The actual outcomes for participants who completed a training program were better than the predicted upper-bound outcomes.

The lower and upper bound values provide a range for the predicted outcome value, making it a more conservative estimate. This range accounts for the variability in the data and allows us to be more flexible when setting expectations for training program

effectiveness. The upper bound will always be greater than the predicted outcome value, and the lower bound will always be lower.

#### Overall Rating

For simplicity, each training provider program was assigned an overall effectiveness rating based on the cumulative total of the three outcome metrics' (employment and wage 2nd quarter after exit, and employment 4th quarter after exit) scores. We assigned an overall rating only if the training program had data available for all three outcome metrics. Training programs were separated into three categories based on their overall effectiveness rating.

The overall ratings were assigned as follows:

- Exceeded Expectations: Program had an overall outcomes rating of eight or nine.
- Met Expectations: Program had an overall outcomes rating of five, six, or seven.
- Below Expectations: Program had an overall outcomes rating of three or four.

#### **Results**

The study assigned an overall rating to training programs only if participant outcomes data was available for all three outcome measures. There were 55 training providers offering 80 training programs that had participant outcomes data available for all three outcome measures. Of these, 24 percent exceeded expectations, 60 percent met expectations, and 16 percent were below expectations. Figure 4 captures the distribution of programs by rating. The overall rating for each program can be found in Appendix A.

Among the 19 training programs that performed above expectations, 15 were Health Professions and Related Programs programs. Other programs that exceeded expectations came from Transportation and Materials Moving; Business, Management, Marketing, and Related Support Services; Computer And Information Sciences and Support Services; and Culinary, Entertainment, and Personal Services training subject groups.

There were 12 programs that performed below expectations. Among the 12 programs, nine came from Health Professions and Related Program and three came from Transportation and Materials Moving.

#### **Application**

The ability to better understand the effectiveness of different training programs, specifically, and training subjects more generally, will allow workforce staff and job seekers alike to make better informed decisions. Workforce staff can use this information to inform workforce policy, allocate funding for training, and elevate training provider standards. Jobs seekers can use this information to identify training programs

or training subjects that will give them the best opportunity to obtain a job with better pay.

## Conclusion and Next Steps

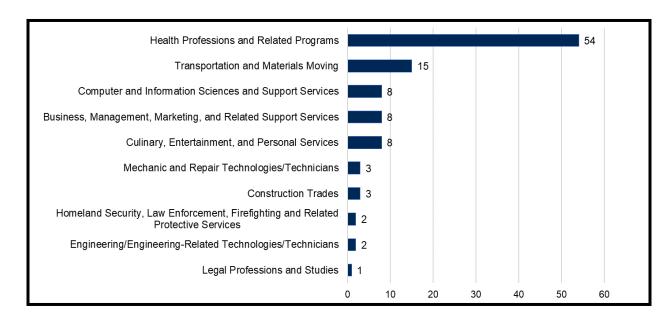
Previously, the evaluation of training program effectiveness was extremely difficult given the varying characteristics of the participants being served, training providers and training programs offered and the employment conditions of local economies. This research attempted to develop a framework that workforce staff and job seekers could use to identify the most important externalities, and quantify their impact on participant employment and wage outcomes. Future analysis will build from the analysis presented in this report, and focus on developing standard resources for workforce board members, workforce staff and job-seeker participants to use.

## **Appendix A: Research and Evaluation**

Table 1. Program Training Subjects

Classification of Instructional Program Code	Program Occupation Type
11	Computer and Information Sciences and Support Services
12	Culinary, Entertainment, and Personal Services
15	Engineering/Engineering-Related Technologies/Technicians
22	Legal Professions and Studies
43	Homeland Security, Law Enforcement, Firefighting and Related Protective Services
46	Construction Trades
47	Mechanic and Repair Technologies/Technicians
49	Transportation and Materials Moving
51	Health Professions and Related Programs
52	Business, Management, Marketing, and Related Support Services

Figure 1. Number of Programs by Training Subject





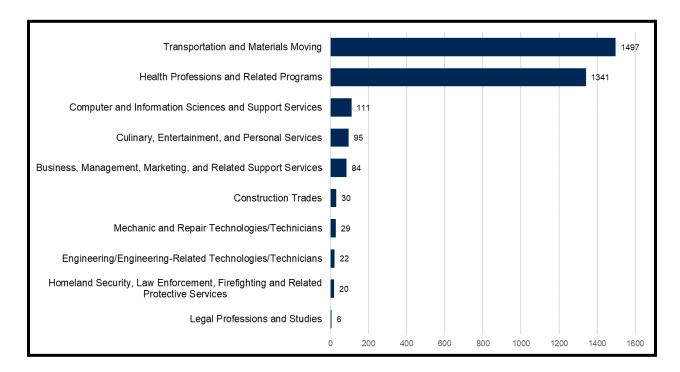
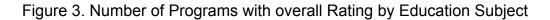


Table 2. Training Program Effect on Employment and Wage Outcomes by Training Subject

Program	Program Occupation Type	Training Program Effect on Employment and Wage Outcomes						
CIP Code		Change in Emp. 2nd Qtr. After Exit	Change in Emp. 4th Qtr. After Exit	Change in Wage 2nd Qtr. After Exit				
51	Health Professions and Related Programs	15.1%	14.0%	\$1,223				
49	Transportation and Materials Moving	12.7%	7.6%	\$2,060				
47	Mechanic and Repair Technologies/Technicians	10.6%	3.0%	\$1,545				
46	Construction Trades	9.6%	5.8%	\$512				
43	Homeland Security, Law Enforcement, Firefighting and Related Protective Services	9.0%	4.8%	\$5,705				
11	Computer and Information Sciences and Support Services	8.0%	6.3%	\$1,183				
15	Engineering/Engineering-Related Technologies/Technicians	6.3%	10.0%	\$1,264				
52	Business, Management, Marketing, and Related Support Services	4.7%	1.5%	\$61				
22	Legal Professions and Studies	-1.8%	-5.3%	-\$1,649				
12	Culinary, Entertainment, and Personal Services	-9.5%	-5.2%	-\$1,334				
99	Participants who did not enter/complete a training	-	-	-				



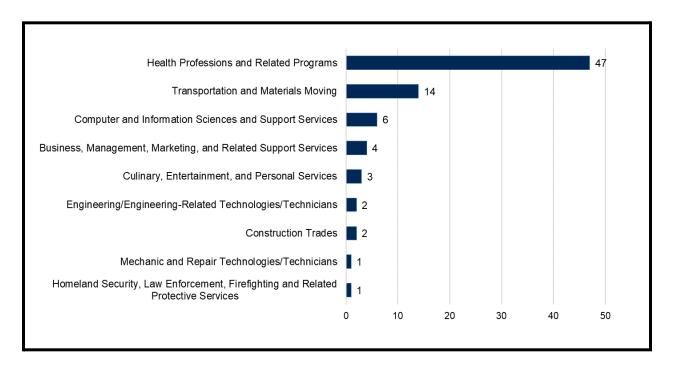


Figure 4. Number of Training Programs by Overall Effectiveness Rating



## Training Provider Rating

		Employment 2nd quarter After Exit			Employment 4thquarter After Exit			Wages 2nd Quarter After Exit									
Eligible Training Provider Name	Program Name	Total Exiters	Actual	Predicted Upper Bound		Rating	Total Exiters	Actual	Predicted		Rating	Total Exiters	Actual	Predicted Upper Bound		Rating	Overall Rating
Yuma Truck Driving School	Ground Transportation.	79	86%	91%	81%	2	65	83%	83%	72%	2	79	\$8,916	\$9,348	\$7,946	2	6
America's Best AMT Courses	Air Transportation.	16	81%	82%	69%	2	16	88%	72%	58%	3	16	\$0	\$11,078	\$9,104	1	6
Accord Healthcare Institute	Practical Nursing, Vocational Nursing and Nursing Assistants.	66	83%	88%	79%	2	59	80%	83%	74%	2	66	\$6,990	\$8,065	\$6,920	2	6
Arizona Medical Training Institute (formerly RSAA)	Practical Nursing, Vocational Nursing and Nursing Assistants.	13	77%	85%	75%	2	11	64%	80%	69%	1	13	\$7,947	\$7,783	\$6,295	3	6
Arizona School of Dental Assisting	Dental Support Services and Allied Professions.	24	79%	84%	75%	2	22	82%	78%	68%	3	24	\$6,331	\$8,177	\$6,915	1	6
Northland Hospice & Palliative Care	Allied Health and Medical Assisting Services.	7	86%	94%	81%	2	7	86%	84%	69%	3	7	\$6,568	\$8,409	\$6,817	1	6
Pima Medical Institute	Allied Health and Medical Assisting Services.	9	78%	89%	77%	2	8	88%	85%	72%	3	9	\$6,370	\$8,271	\$6,732	1	6
(ABL) Advanced Business Learning - CompTIA ATP	Computer/Information Technology Administration and Management.	27	59%	77%	63%	1	21	67%	75%	60%	2	27	\$10,341	\$9,962	\$7,992	3	6
160 Driving Academy Southwest Truck Driver	Ground Transportation.	8	75%	81%	72%	2	5	20%	72%	63%	1	8	\$10,048	\$9,334	\$8,102	3	6
Training Inc Tucson	Ground Transportation.	253	75%	83%	75%	2	217	68%	75%	66%	2	253	\$8,763	\$9,809	\$8,612	2	6
All Beauty College	Cosmetology and Related Personal Grooming Services.	16	63%	71%	55%	2	14	64%	78%	60%	2	16	\$3,941	\$5,707	\$3,239	2	6
New Horizons of Phoenix	Computer/Information Technology Administration and Management.	8	63%	64%	51%	2	8	50%	61%	46%	2	8	\$7,248	\$9,376	\$7,424	1	5
Arizona College - Mesa	Allied Health and Medical Assisting Services.	12	83%	92%	78%	2	11	64%	85%	68%	1	12	\$8,105	\$8,282	\$6,197	2	5
HDS Truck Driving Institute, Inc.	Ground Transportation.	137	77%	83%	75%	2	97	71%	75%	66%	2	137	\$8,095	\$9,660	\$8,536	1	5
Phoenix College	Health and Medical Administrative Services.	9	67%	78%	70%	1	9	89%	76%	68%	3	9	\$5,729	\$7,185	\$6,115	1	5
Phoenix College	Allied Health and Medical Assisting Services.	23	70%	81%	73%	1	16	69%	78%	69%	2	23	\$6,730	\$7,091	\$5,774	2	5
Regional Center for Border Health, Inc.	Health and Medical Administrative Services.	16	81%	92%	83%	1	14	93%	90%	80%	3	16	\$6,517	\$8,044	\$6,797	1	5
New Horizons of Phoenix	Computer and Information Sciences, General.	7	71%	75%	60%	2	7	57%	71%	54%	2	7	\$2,578	\$9,985	\$7,741	1	5
CareGiver Training Institute	Health Aides/Attendants/Orderlies.	16	81%	85%	78%	2	15	80%	82%	74%	2	16	\$5,860	\$7,636	\$6,652	1	5
Providence Training Institute	Allied Health and Medical Assisting Services.	22	82%	87%	79%	2	15	67%	83%	74%	1	22	\$8,386	\$8,424	\$7,305	2	5
The Meadows of Northern Arizona, Inc.	Practical Nursing, Vocational Nursing and Nursing Assistants.	45	91%	102%	90%	2	36	78%	93%	80%	1	45	\$6,679	\$8,136	\$6,499	2	5
Pima Community College	Ground Transportation.	26	73%	85%	77%	1	24	79%	77%	69%	3	26	\$7,325	\$10,156	\$9,058	1	5
Pima Community College	Operations.	15	53%	76%	61%	1	12	67%	70%	55%	2	15	\$6,341	\$7,571	\$5,616	2	5
Academy On-Demand DBA Academy for Caregiving Excellence	Practical Nursing, Vocational Nursing and Nursing Assistants.	36	81%	87%	79%	2	28	75%	81%	72%	2	36	\$6,330	\$8,126	\$7,006	1	5
Brookline College - Phoenix	Allied Health and Medical Assisting Services.	8	75%	92%	78%	1	7	86%	87%	69%	2	8	\$6,088	\$7,986	\$6,248	1	4
Yavapai College	Ground Transportation.	8	75%	93%	80%	1	8	63%	80%	66%	1	8	\$8,645	\$9,237	\$7,404	2	4
American Institute of Trucking dba Roadmaster Drivers School	Ground Transportation.	37	70%	81%	73%	1	26	69%	72%	63%	2	37	\$7,238	\$10,059	\$8,953	1	4
Providence Training Institute	Practical Nursing, Vocational Nursing and Nursing Assistants.	20	75%	84%	76%	1	17	71%	78%	69%	2	20	\$6,679	\$8,207	\$6,973	1	4

		Employment 2nd quarter After Exit				Employment 4thquarter After Exit					Wages 2	nd Quarter	After Exit				
Eligible Training Provider Name	Program Name	Total Exiters	Actual	Predicted Upper Bound	Predicted Lower Bound	Rating	Total Exiters	Actual	Predicted Upper Bound	Predicted Lower Bound	Rating	Total Exiters	Actual	Predicted Upper Bound	Predicte d Lower Bound		Overall Rating
Yavapai College	Health Aides/Attendants/Orderlies.	8	88%	101%	90%	1	6	83%	89%	77%	2	8	\$5,331	\$8,643	\$7,051	1	4
Regional Center for Border Health, Inc.	Practical Nursing, Vocational Nursing and Nursing Assistants.	39	79%	94%	84%	1	34	79%	87%	76%	2	39	\$6,325	\$8,174	\$6,875	1	4
Academy On-Demand DBA Academy for Caregiving Excellence	Health Aides/Attendants/Orderlies.	15	73%	82%	72%	2	14	57%	78%	67%	1	15	\$5,702	\$8,294	\$6,676	1	4
RI International (a dba for Recovery Innovations, Inc.)	Mental and Social Health Services and Allied Professions.	53	64%	75%	67%	1	51	61%	70%	61%	1	53	\$6,708	\$8,211	\$6,991	1	3
Eii - Images Enterprises LLC.	Ground Transportation.	30	57%	76%	68%	1	27	59%	68%	59%	1	30	\$6,899	\$9,502	\$8,438	1	3
Accord Healthcare Institute	Clinical/Medical Laboratory Science/Research and Allied Professions.	22	73%	88%	80%	1	20	60%	85%	76%	1	22	\$6,559	\$8,926	\$7,793	1	3
Altrain Medical and Dental Assisting Academy, LLC	Dental Support Services and Allied Professions.	32	66%	84%	76%	1	26	58%	81%	72%	1	32	\$5,654	\$8,255	\$7,087	1	3
American Institute of Dental Assisting	Dental Support Services and Allied Professions.	32	72%	88%	79%	1	24	63%	83%	72%	1	32	\$6,296	\$8,480	\$7,220	1	3

## **Appendix B: Local Area Initiatives and Success Stories**

#### **Coconino County**

#### Participant Success Story: Arturo

Arturo's juvenile probation officer referred him to the ARIZONA@WORK Coconino County for career services and job-placement assistance. Although he faced significant challenges, he was determined to establish a career and progress from fast-food jobs. He wanted employment that would allow him to help his family and get a place of his own to live.

Arturo's objective was to get his Commercial Driver's License (CDL), so the Youth program facilitated his enrollment in the Phoenix Truck Driving school at Coconino Community College. He worked hard to get his permit and had to take his test twice, while his workforce coach continued to encourage him. As a result of Arturo's perseverance, he received his CDL permit and, after four weeks, received his CDL. The Youth program assisted with his placement at Legacy Beverage, where after two weeks, he was driving his own truck and making deliveries for the company.

The collaboration between Arturo's probation officer and ARIZONA@WORK Coconino County, their support, and Arturo's dedication and hard work set him on the path to self-sufficiency.

#### **Maricopa County**

## Participant Success Story: Ricky

Ricky is a veteran who served one year in the Army and four years in the National Guard. Ricky received a dishonorable discharge from duty and had been in and out of prison for 42 years. At one point, Ricky was incarcerated for 26 years for armed robbery, kidnapping, and aggravated assault. Ricky's most recent sentence was for a probation violation, which resulted in another three-year incarceration. After Ricky was released in February 2022, Ricky lived at New Freedom for three months, where he engaged in and completed intensive therapy. At New Freedom, Ricky was connected with ARIZONA@WORK Maricopa County and began his journey toward becoming an active contributor to his community.

At Maricopa County, Ricky participated in the Smart Justice Program and received individualized services. He was also enrolled in the WIOA Adult Program and received occupational skills training that led to a CDL.

Through hard work and dedication, despite many life barriers, Ricky was successful with his training and was awarded his CDL. With the training completed, Ricky's career advisor recognized that Ricky lacked resources to purchase work-related items. Thus,

the Adult Program provided supportive services, including work boots and tools. In December 2022, he gained employment with Otto Trucking and started receiving a livable wage as a commercial truck driver.

Ricky Reports: "I have overcome a great deal to finally begin a productive life. I love my job driving my double belly dump truck. Though it was difficult to begin my very first career, Maricopa County Workforce not once ever failed to help me, especially with my computer struggles. Thank you. Seriously, thank all of you! "

#### **Mohave-La Paz Counties**

#### Participant Success Story: Donald

Donald's triumph is a testament to the synergy of determination, assistance, and cooperation in overcoming obstacles and attaining personal and vocational advancement. His narrative underscores the pivotal elements that contributed to his successful integration into the workforce.

Initially, Donald's lack of trust in institutions stemmed from a sense of abandonment as a veteran. Through collaboration with ARIZONA@WORK Mohave-La Paz Counties, specifically the programs under Titles I and III of WIOA, Donald discovered the assistance he required to rekindle his self-assurance. Central to his success was his career coach, who adeptly navigated his unique challenges. This entailed addressing barriers such as an expired CDL-A license, absence of a cell phone or any technological devices, limited transportation and past traumatic job experiences. This customized approach fostered trust and facilitated Donald's transformation.

The story illustrates the program's responsiveness to Donald's immediate needs. By furnishing him with a cell phone and procuring his driving record, the program demonstrated its dedication to dismantling hindrances to his progress. Equally significant was the provision of interview attire and work attire, bolstering not only his self-esteem but also his sense of being valued and upheld.

The career coach's role in empowering Donald to embrace assistance emerges as a linchpin. The coach's persistence and empathy proved pivotal in steering Donald toward aid acceptance, ushering in positive life transformations.

Beyond addressing hurdles, the ARIZONA@WORK initiative paved Donald's way to job prospects. Reinstating and transferring his CDL-A license, aiding his Department of Transportation physical retake, and facilitating his commute through insurance and gas vouchers positioned him for success in work experience. The program's collaboration with the Mohave County Fairgrounds exemplifies the symbiotic relationship between workforce programs and potential employers. The Fairgrounds' endorsement via a recommendation letter underscores Donald's commitment and the efficacy of his support system.

Donald's ultimate attainment of a full-time position as a Road Division Driver for Public Works underscores the ARIZONA@WORK's impact, substantiating enduring positive change. In essence, Donald's odyssey from skepticism and barriers to success typifies the potency of a holistic, tailored workforce development approach.

### **Pima County**

#### Participant Success Story: Jennifer

Jennifer enrolled in the Building and Construction Technologies Integrated Basic Education Skills Training Program, with a focus on carpentry, at Pima Community College in Fall 2022. From the first day of the program, Jennifer displayed an exceptional work ethic and dedication to her academic goals. She always arrived at class on time and had perfect attendance for the last two semesters. She paid close attention in each class and always asked pertinent questions and responded with meaningful and thoughtful information and ideas. Jennifer completed her assignments on time, took feedback from the instructors seriously, and sought ways to learn and improve from her mistakes. She provided support to her classmates whenever she could and studied with them outside of the classroom. Jennifer became an advocate for adult learners, using her voice to share her story and encourage others to reach for education to transform their lives. With her outstanding efforts, she received all A's in her classes in Fall 2022. Jennifer exemplifies what it means to be an Adult Education Honor Student.

## **Pinal County**

## Re-Imagining Our Future

On Thursday, October 20, 2022, members of the Pinal County Workforce Board, County Supervisors, and County Leadership as well as leaders from the business and education sectors came together to discuss reimagining the future of the workforce in Pinal County. See video (<a href="https://www.youtube.com/watch?v=nPFHPEa4RBk">https://www.youtube.com/watch?v=nPFHPEa4RBk</a>)

#### Pinal County Workforce Development Board Recognized with WIOA Trailblazer Award

The National Association of Workforce Boards (NAWB) has recognized Pinal County's Workforce Development Board with the prestigious WIOA Trailblazer Award for its continual assessment, alignment, and advancement of core workforce development services, which has maximized the community impact of the WDB's work, producing entirely new training, recruiting, and career opportunities for workers and employers in Pinal County.

Pinal County's Workforce Development Board was selected out of a large pool of nominations for the WIOA Trailblazer Award, which recognizes outstanding and locally impactful efforts to adopt the changes envisioned in the WIOA. The Workforce Development Board accepted the award at the 2023 NAWB Forum, an annual convening of workforce stakeholders held March 25-28, 2023 in Washington, D.C.

Explaining why Pinal County was chosen for this recognition, Janet Bray, Senior Advisor with NAWB, said, "The Awards Committee was very impressed with the strategic and collaborative efforts the Workforce Development Board has put forth with WIOA partners to provide integrated services and cross-training staff. The focus on youth, adults, and community needs contributed significantly to the value the workforce board brings to the community. The initiatives and efforts of Pinal County WDB are applauded."

Liz Tuck, Chair of the Pinal County Workforce Development Board, commented, "I am delighted and honored for the Pinal County Workforce Development Board to receive this national recognition for developing creative solutions that provide enhanced services to business owners and job seekers. This wouldn't be possible without forward-looking members of our Board and dedicated staff."

#### **Yuma County**

#### Participant Success Story: Carolina

Carolina was enrolled in the ARIZONA@WORK Yuma Adult Program, seeking assistance with job training or for help in obtaining employment. Prior to participation in the program, Carolina lost her job as a payroll assistant and was charged with fraudulent activities. Due to her offender status she faced challenges finding a job and was very worried about her future.

In the program, Carolina received intensive case management services, attended various workshops and job clubs, and exhibited a strong desire to find employment that could lead to a career.

On December 20, 2022, the program placed Carolina in a sales clerk internship at a thrift shop. Although Carolina was deemed successful during her internship, the thrift shop had concerns about taking Carolina on, beyond her internship, due to her ex-offender status. Faced with this potential setback, Carolina's case advisor took the opportunity to speak with the thrift shop management and highlighted Carolina's motivation to be a good employee and the dedication exhibited during the internship. The case advisor also facilitated OJT for Carolina for the position of assistant manager, which she successfully completed.

Carolina's journey with the thrift shop has been remarkable and evidence of her dedication and resolve to overcome barriers and grow professionally. For ARIZONA@WORK's helpful intervention, Carolina expressed her gratitude by saying, "I am very thankful for the program."

#### Youth Mural Project

Five participants in the ARIZONA@WORK Youth Program painted a mural at the Portable, Practical Educational Preparation Park in San Luis, Arizona. The mural

depicts a pair of hands holding a head of lettuce against the backdrop of an Aztec symbol:



## **Appendix C: Arizona Economic Analysis**

OEO produces demographic, labor force, regulatory, workforce, and economic information for Arizona. OEO submitted the following summary of economic highlights for PY 2022.

Prior to the recession (February 2020 to April 2020) brought on by the COVID-19 Pandemic, the Arizona economy was recording robust growth according to several key economic variables. Total nonfarm employment had increased Year-Over-Year (YoY) for 113 consecutive months, while the unemployment rate reached record lows. The recession had a notably negative impact on the Arizona economy in PY 2019, but PY 2020 and PY 2021 fostered a strong economic recovery that continued through PY 2022. Total nonfarm employment increased over the PYs, while the Arizona unemployment rate fell below pre-pandemic lows. Employment growth is likely to continue, as OEO has projected employment growth to continue in nearly all supersectors through Q2 2024.

Some economic highlights for PY 2022 include:

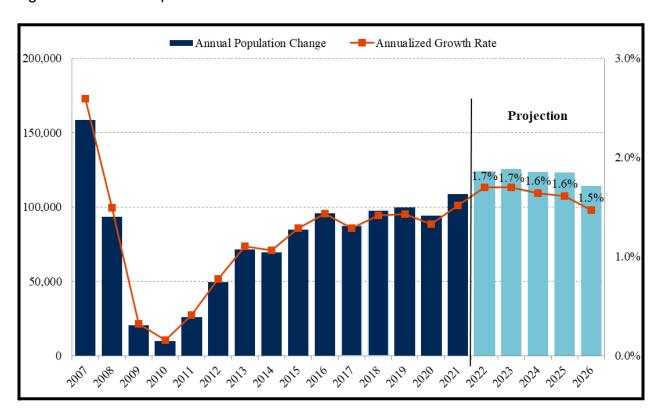
- Arizona's population continued to grow across the state, and is projected to continue to increase over the next several years.
- In June 2023, the Arizona unemployment rate was 3.5 percent, which was lower than the United States (U.S.) unemployment rate of 3.6 percent in the same month.
- Arizona gained 75,000 jobs YoY in June 2023. These gains were recorded in nine of eleven supersectors.
- Six of seven Metropolitan Statistical Areas (MSA) in Arizona gained jobs YoY in June 2023. Flagstaff MSA recorded the highest growth rate (3.6 percent), followed by Phoenix-Mesa-Scottsdale MSA (2.5 percent) and Yuma MSA (2.4 percent).
- Ten of eleven supersectors, including Self-Employed, are projected to gain jobs through Q2 2024. Manufacturing is projected to have the highest percent change (7.0 percent growth), while Trade, Transportation, and Utilities is projected to record the largest job gains (18,557 jobs).
- The State Coincident Index for Arizona, an indicator for measuring economic activity, improved to 171.7 in June 2023 from a 53-month low of 125.8 in April 2020.
- Arizona per capita personal income grew 2.0 percent from CY 2021 to CY 2022. U.S. per capita personal income also grew 2.0 percent over the same period.

Figure 1: Arizona Population Projections

Year	Popul ation	Population Change	Population % Change	Natural Change (Births - Deaths)	Total Net Migration (Inflows - Outflows)	Special Population Change <sup>1</sup>					
2022	7,409,189	-	-	-785	124,604	-					
2023	7,534,922	125,733	1.7%	9,563	112,744	3,427					
2024	7,658,633	123,711	1.6%	13,438	106,732	3,541					
2025	7,781,973	123,340	1.6%	17,491	102,186	3,663					
2026	7,896,344	114,370	1.5%	16,959	97,411	-					
,	Source: Office of Economic Opportunity 2022 - 2060 Population Projections, Medium Series  Special population changes are related to the temporary residencies caused by university students										

Population growth in Arizona is projected to grow by 1.7 percent (125,733 individuals) in CY 2023. Approximately 7.6 percent of this growth is attributed to natural change (more births than deaths), while nearly 90 percent of this growth is attributed to net migration (more individuals moving into Arizona than leaving). Arizona's population is projected to continue to grow by more than 110,000 individuals each year through 2026.

Figure 2: Arizona Population Growth



Source: OEO 2022-2060 Population Projections, Medium Series

Arizona's population growth rate has exceeded 1.0 percent every year since CY 2013 (see figure 2). CY 2009 and CY 2010 had particularly low population growth rates due to the impacts of the Great Recession (December 2007 – June 2009). As the Arizona economy recovered from 2011-2019, net migration began to increase.

Arizona — United States

16%

14%

12%

10%

8%

6%

4%

2%

0%

1, pr. 1/2 | pr. 1/2

Figure 3: Arizona and U.S. Seasonally-Adjusted Unemployment Rates

Source: OEO in cooperation with the U.S. Bureau of Labor Statistics, Local Area Unemployment Statistics

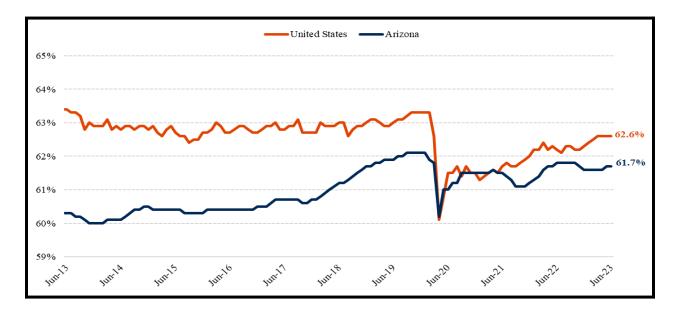


Figure 4: Arizona and U.S. Labor Force Participation Rates

Source: Federal Reserve Bank of St. Louis

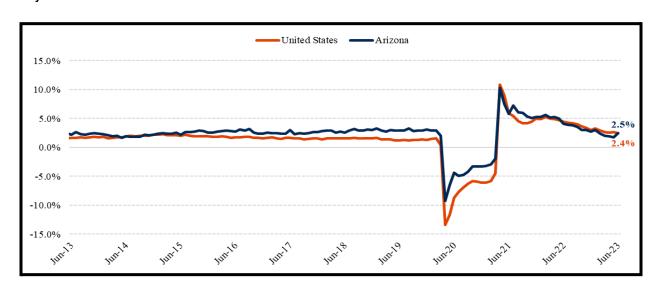
Note: Data is seasonally-adjusted

Since the Great Recession, Arizona's unemployment rate and labor force participation rate have generally recorded positive changes. This trend ended abruptly in March 2020, when the Arizona unemployment rate increased, and labor force participation decreased. These trends mirrored national trends, and can be attributed to the effects of COVID-19.

After the initial negative impacts to the economy caused by the COVID-19 Pandemic subsided, Arizona employment began to grow, while the unemployment rate began to decline. Arizona began PY 2022 with a seasonally-adjusted unemployment rate of 3.9 percent in July 2022 and ended PY 2022 with an unemployment rate of 3.5 percent in June 2023. The U.S. began PY 2022 with a seasonally-adjusted unemployment rate of 3.5 percent, and ended PY 2022 with an unemployment rate of 3.6 percent in June 2023.

Figure 4 compares monthly labor force participation rates between the U.S. and Arizona. The Arizona labor force participation rate has trended below the U.S. labor force participation rate historically. From PY 2014 to PY 2018, the Arizona labor force participation rate recorded positive growth, but in April 2020, experienced a sharp decline due to the COVID-19 Pandemic. Neither the Arizona labor force participation rate nor the U.S. labor force participation rate has reached pre-pandemic highs. Arizona's labor force participation rate was 61.8 percent at the beginning of PY 2022 (July 2022), and 61.7 percent by the end of PY 2022 (June 2023). The United States (U.S.) labor force participation rate was 62.1 percent at the beginning of PY 2022, and 62.6 percent by the end of PY 2022.

Figure 5: Arizona and U.S. Nonfarm Employment Year-to-Year Change, Not Seasonally Adjusted



Source: OEO in cooperation with the U.S. Bureau of Labor Statistics, Current Employment Statistics

Figure 5 compares annual nonfarm employment growth rates between the U.S. and Arizona. From October 2014 through March 2021, Arizona's nonfarm job YoY growth rates have equaled or exceeded U.S. nonfarm growth rates in every month. Before declining to -9.2 percent in April 2020, Arizona nonfarm employment recorded positive YoY employment change for 113 consecutive months. Arizona nonfarm employment increased by 2.5 percent YoY in June 2023, while U.S. nonfarm employment growth increased by 2.4 percent YoY in June 2023.

Figure 6: Arizona Employment Growth by Industry, Not Seasonally Adjusted (In Thousands, Reference Month of June

Figure 6: Arizona Employment Growth by Industry						
Not Seasonally Adjusted						
(in thousands, reference month of June)						
	PY 2018	PY 2019	PY2020	PY2021	PY2022	
Total Nonfarm OTY Percentage Change	81.4 2.9%	-125.2 -4.3%	158.8 5.8%	119.8 4.1%	7 <b>5.0</b> 2.5%	
Natural Resources & Mining OTY Percentage Change	0.3 2.3%	-1.5 -11.0%	-0.1 -0.8%	<b>0.7</b> 5.8%	1.6 12.6%	
Construction OTY Percentage Change	<b>13.7</b> 8.7%	3.0 1.7%	<b>4.3</b> 2.5%	16.4 9.2%	2.6 1.3%	
Manufacturing OTY Percentage Change	6.7 3.9%	-2.1 -1.2%	5.0 2.8%	10.5 5.8%	3.0 1.6%	
Trade, Transportation, & Utilities OTY Percentage Change	8.8 1.7%	-0.5 -0.1%	<b>37.5</b> 7.0%	19.5 3.4%	5.9 1.0%	
Information OTY Percentage Change	1.8 3.8%	-6.5 -13.2%	<b>4.5</b> 10.5%	<b>4.2</b> 8.9%	-1.9 -3.7%	
Financial Activities OTY Percentage Change	8.0 3.7%	5.6 2.5%	12.3 5.3%	2.2 0.9%	3.0 1.2%	
Professional & Business Services OTY Percentage Change	14.8 3.5%	-19.5 -4.4%	16.9 4.0%	<b>22.9</b> 5.2%	9.2 2.0%	
Private Education & Health Services OTY Percentage Change	17.2 4.0%	-9.4 -2.1%	16.2 3.7%	13.1 2.9%	<b>23.6</b> 5.0%	
Leisure & Hospitality OTY Percentage Change	<b>4.</b> 7 1.5%	-65.5 -19.9%	44.4 16.9%	25.2 8.2%	14.7 4.4%	
Other Services OTY Percentage Change	1.5 1.6%	-11.7 -12.4%	9.0 10.8%	5.7 6.2%	-1.0 -1.0%	
Government OTY Percentage Change	3.9 1.0%	-17.1 -4.4%	8.8 2.4%	-0.6 -0.2%	14.3 3.8%	

Source: OEO in cooperation with Bureau of Labor Statistics, Current Employment Statistics

Figure 6 shows nonfarm employment levels and the percentage change from prior PYs. Nonfarm employment increased sharply in PY 2020 and PY 2021. This is primarily due to the impact of COVID-19 in PY 2019, when nine of the eleven supersectors lost jobs over the year. YoY increases in nonfarm employment continued through PY 2022.

Among the eleven supersectors in PY 2022, Natural Resources and Mining had the highest YoY employment growth rate (12.6 percent). This was followed by Private Education and Health Services (5.0 percent); Leisure and Hospitality (4.4 percent); and Government (3.8 percent). Supersectors that did not exceed Arizona's total nonfarm employment growth rate (2.5 percent) include Professional and Business Services (2.0 percent); Manufacturing (1.6 percent); Construction (1.3 percent); Financial Activities (1.2 percent); and Trade, Transportation, and Utilities (1.0 percent). Two supersectors lost jobs YoY: Other Services (-1.0 percent) and Information (-3.7 percent).

Numerically, YoY in PY 2022, Private Education and Health Services gained 23,600 jobs; Leisure and Hospitality gained 14,700 jobs; Government gained 14,300 jobs; Professional and Business Services gained 9,200 jobs; Trade, Transportation, and Utilities gained 5,900 jobs; Manufacturing gained 3,000 jobs; Financial Activities gained 3,000 jobs; Construction gained 2,600 jobs; Natural Resources and Mining gained 1,600 jobs; Information lost 1,900 jobs; and Other Services lost 1,000 jobs. Total nonfarm employment increased by 75,000 YoY in PY 2022.

Figure 7: Arizona Total Nonfarm Gains by Region, Not Seasonally Adjusted (In Thousands, Reference the Month of June)

	PY 2018	PY 2019	PY 2020	PY 2021	PY 2022
Arizona OTY Percentage Change	<b>81.4</b> 2.9%	- <b>125.2</b> -4.3%	158.8 5.8%	<b>119.8</b> 4.1%	<b>75.0</b> 2.5%
United States OTY Percentage Change	<b>1,784</b> 1.2%	- <b>13,207</b> -8.7%	<b>8,119</b> 5.9%	<b>6,591</b> 4.5%	<b>3,728</b> 2.4%
Flagstaff MSA OTY Percentage Change	<b>0.3</b> 0.4%	- <b>7.1</b> -10.5%	<b>2.9</b> 4.8%	<b>3.3</b> 5.2%	<b>2.4</b> 3.6%
Lake Havasu City-Kingman MSA OTY Percentage Change	<b>0.8</b> 1.6%	- <b>1.3</b> -2.5%	3.2 6.4%	<b>1.7</b> 3.2%	<b>0.0</b> 0.0%
Phoenix-Mesa-Scottsdale MSA OTY Percentage Change	<b>69.0</b> 3.3%	- <b>83.1</b> -3.9%	<b>129.8</b> 6.3%	<b>100.8</b> 4.6%	<b>58.0</b> 2.5%
Prescott MSA OTY Percentage Change	<b>0.2</b> 0.3%	- <b>3.0</b> -4.6%	<b>3.3</b> 5.3%	<b>2.0</b> 3.1%	<b>1.2</b> 1.8%
Sierra Vista-Douglas MSA OTY Percentage Change	<b>0.0</b> 0.0%	<b>0.4</b> 1.2%	- <b>0.3</b> -0.9%	<b>0.0</b> 0.0%	<b>0.4</b> 1.2%
Tucson MSA OTY Percentage Change	<b>8.5</b> 2.3%	- <b>20.3</b> -5.3%	<b>11.2</b> 3.1%	<b>11.1</b> 3.0%	<b>5.0</b> 1.3%
Yuma MSA OTY Percentage Change	<b>1.8</b> 3.4%	- <b>2.7</b> -4.9%	<b>3.3</b> 6.3%	<b>2.9</b> 5.2%	<b>1.4</b> 2.4%

Source: OEO in coordination with Bureau of Labor Statistics, Current Employment Statistics

The geographic distribution of job growth in Arizona is predominantly concentrated in the Phoenix-Mesa-Scottsdale MSA (2.5 percent growth), though in PY 2022, Flagstaff MSA (3.6 percent growth) was the lone Arizona MSA that grew at a rate exceeding the job growth rate of Arizona (2.5 percent). Flagstaff MSA and Phoenix-Mesa-Scottsdale MSA also surpassed the United States' job growth rate of 2.4 percent. The job growth rates for Yuma MSA (2.4 percent), Prescott MSA (1.8 percent), Tucson MSA (1.3 percent), Sierra Vista-Douglas MSA (1.2 percent), and Lake Havasu City-Kingman MSA (0.0 percent) trailed Arizona's job growth rate.

Figure 8: Arizona Employment Shares June 2013 to June 2023, Not Seasonally Adjusted

Supers ector Title	June 2013 Share	June 2023 Share	Share Change	Numeric Change	
Construction	5.1%	6.4%	1.3%	73,100	
Private Education & Health Services	14.9%	15.9%	1.0%	126,000	
Fin an cial Activities	7.4%	8.0%	0.6%	65,800	
Professional & Business Services	15.1%	15.2%	0.2%	100,600	
Leisure & Hospitality	11.1%	11.2%	0.1%	74,200	
Trade, Transportation, & Utilities	19.2%	19.3%	0.1%	124,800	
Manufacturing	6.4%	6.3%	-0.1%	37,800	
Natural Resources & Mining	0.5%	0.5%	-0.1%	700	
Information	1.7%	1.6%	-0.2%	6,400	
Other Services	3.5%	3.1%	-0.4%	9,100	
Government	15.1%	12.5%	-2.6%	16,300	
Total	100.0%	100.0%	0.0%	634,800	
Source: Office of Economic Opportunity in coordination with Bureau of Labor Statistics, Current Employment Statistics					

Figure 8 shows how the composition of Arizona's economy has changed in the past decade. From June 2013 to June 2023, Construction increased its share of nonfarm employment by 1.3 percentage points, the largest share increase over this period. Other supersectors that recorded positive employment share gains included Private Education and Health Services (1.0 percentage points), Financial Activities (0.6 percentage points), Professional and Business Services (0.2 percentage points), Leisure and Hospitality (0.1 percentage points), and Trade, Transportation and Utilities (0.1 percentage points). The largest decrease in nonfarm employment share occurred in Government, falling by 2.6 percentage points. This was followed by Other Services (-0.4 percentage points), Manufacturing (-0.1 percentage points), and Natural Resources and Mining (-0.1 percent).

Figure 9: Arizona Short-Term Industry Employment Projections 2022-2024

Supersector Title	Base Employment 2022 Q2	Projected Employment 2024 Q2	Numeric Change	Percent Change	
Manufacturing	190,244	203,544	13,300	7.0%	
Information	52,951	56,465	3,514	6.6%	
Leisure & Hospitality	356,217	373,675	17,458	4.9%	
Professional & Business Services	468,563	486,020	17,457	3.7%	
Trade, Transportation & Utilities	613,787	632,344	18,557	3.0%	
Private Education & Health Services	642,042	657,864	15,822	2.5%	
Other Services	104,568	107,017	2,449	2.3%	
Construction	194,733	197,613	2,880	1.5%	
Government	160,493	161,885	1,392	0.9%	
Natural Resources & Mining	48,878	49,126	248	0.5%	
Self-Employed	174,755	175,099	344	0.2%	
Financial Activities	234,156	231,360	-2,796	-1.2%	
Source: Office of Economic Opportunity using Short Term Industry Employment Projections 2022-2024					

Figure 9 shows the short-term employment projections for supersectors in Arizona. Ten of the eleven supersectors, along with Self-Employed, are projected to gain jobs in Arizona from Q2 2022 to Q2 2024. The largest percent increase is projected to occur in Manufacturing (7.0 percent), followed by Information (6.6 percent); Leisure & Hospitality (4.9 percent); Professional and Business Services (3.7 percent); Trade, Transportation, and Utilities (3.0 percent); Private Education and Health Services (2.5 percent); Other Services (2.3 percent); Construction (1.5 percent); Government (0.9 percent); Natural Resources and Mining (0.5 percent); and Self-Employed (0.2 percent). Financial Activities is the only supersector projected to record job losses during this period (-1.2 percent).

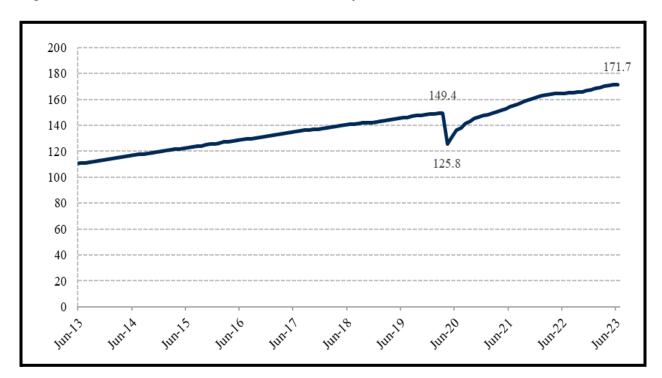


Figure 10: Arizona Coincident Economic Activity

Source: Federal Reserve Bank of St. Louis

Note: This index combines four variables: total nonfarm employment, average hours worked in manufacturing, the unemployment rate, and wages

The coincident economic activity index is an economic indicator compiled by the Federal Reserve that tends to correlate with economic growth. Figure 10 shows the changes in the coincident economic activity index over the past ten years. As the coincident index increases, economic growth tends to increase. After experiencing 125 continuous months of growth, Arizona's coincident index declined by 0.06 in March 2020, dropping to 149.4. The coincident index declined again in April 2020 to 125.8. By June 2021, Arizona's index was at 154.4. In June 2023, the end of PY 22, Arizona's coincident economic activity index had improved to 171.7.

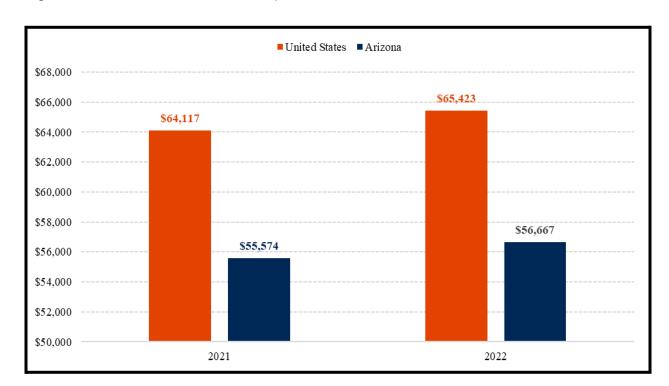


Figure 11: Arizona and U.S. Per Capita Personal Income

Source: OEO in cooperation with the Bureau of Economic Analysis

Arizona's per capita personal income in 2022 was \$55,667, an increase of 2.0 percent from the 2021 per capita personal income of \$55,574 (see figure 11). Over the same period, per capita personal income in the U.S. grew by 2.0 percent, increasing to \$65,423 in 2022 from \$64,117 in 2021. Among the states, Arizona ranked 39th in per capita personal income in 2022.