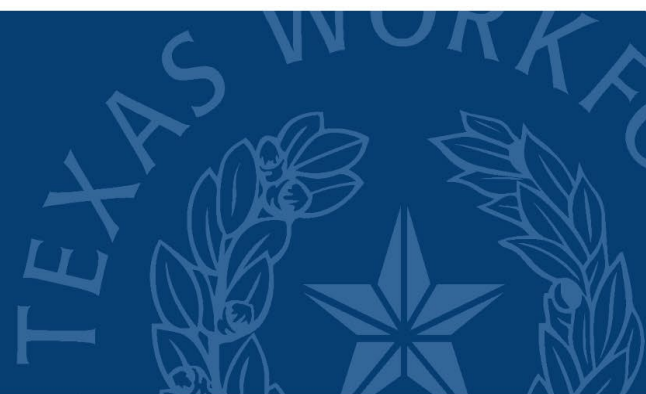# Vocational Rehabilitation Program

State

Texas

Agency

Texas Workforce Commission

Award Category

Business Process Innovations

Project Title

ReHabWorks and Wins in Texas: The Vocational Rehabilitation Replacement Project

Project Dates

September 2021 – August 2023

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What problem or opportunity does the project address?

What would it take to improve the efficiency and effectiveness of vocational rehabilitation case management, while also providing a more modern and user-friendly experience for staff and customers in Texas? The Texas Workforce Commission (TWC) completed the Vocational Rehabilitation (VR) Replacement project to enhance the ReHabWorks system and integrate the legacy Texas Review, Oversight, and Coaching System (TxROCS) into the ReHabWorks environment. This upgrade was essential to assist staff more efficiently with assessing eligibility, identifying, and documenting service needs, case management, service tracking, scheduling; providing a holistic view of the customer; and enhance customer communication.

The "ReHabWorks Renovation" included moving identified VR Division systems to the Amazon Web Services (AWS) cloud environment and implementing needed enhancements:

- Migrate the RehabWorks system to the cloud in the Texas Data Center Services program.
- Integrate TxROCS legacy reporting system's functionality into the RehabWorks system.
- Sustain Enterprise Data Warehouse connectivity.
- Enhance Information sharing (e.g., Virtual Case Files).
- Integrate workflows.
- Enhance customer service (e.g., Customer messaging capability).

Why does it matter?

The issue of the aging system needed to be addressed to migrate off legacy infrastructure to the cloud, integrate single sign-on, and upgrade to modern and easy to support database. In doing so, we were able to:

- Increase customer pathways to services – Our technology is flexible enough to allow customer access to information and services when, where, and how the customer needs it.
- Integrate and align our systems and services – Our systems work together to eliminate duplication, streamline delivery of services, and eliminate the need to support multiple applications and platforms.
- Increase and support economic potential – Our useful and easy to understand system will help more people.

The system is supported by in-house resources and is used by over 1,300 staff across the state.

What makes it different?

TWC deployed the final of three releases for the ReHabWorks renovation on Aug 31,2023. This final release integrated legacy TxROCS into the ReHabWorks environment. Previous releases, in March and June, migrated the RehabWorks system to the Cloud and implemented enhancements, such as a caseload management dashboard, an integrated AI virtual assistant for customer communications,

and reports streamlining. TWC was awarded Amazon Web Services (AWS) State and Local Government Champion at the AWS Imagine Conference in July 2023 for their work on migrating the RehabWorks system to the AWS Cloud. TWC was one of just 16 agencies honored nationwide by AWS from over 7,500 government agencies.

The AI-powered virtual assistant SARA (Semi-Autonomous Research Assistant) facilitates communication and support for customers of the Vocational Rehabilitation program. SARA's AI functionality enables staff communication with customers via text and email, allows customers to request appointments based on counselor availability, and sends reminders for upcoming appointments. SARA automates progress notifications for job searches or school progress and collects and sends necessary documentation. SARA also provides alerts and follow-up messages for pending tasks while automatically documenting customer communications, enabling staff to prioritize meaningful engagement over administrative duties. SARA is available 24/7 for assistance.

What makes it universal?

The project supported the Statewide Strategic Plan, Goal 3, Legacy Modernization - Addressing outdated technology, computer systems, or applications and the NASCIO 2024 CIO Priority of Legacy Application Modernization and Renovation.

Implementation

What was the roadmap?

This project was one of three system modernizations that TWC has worked on in the last four years. All of them are moving to the cloud and implementing modern features to simplify ongoing maintenance and operations.

TWC used a hybrid methodology to implement the system replacement. All requirements were gathered and approved before moving on to iterative design and development. The project was implemented in three phases with the final release integrating legacy TxROCS into the ReHabWorks environment. Releases, in March 2023 and June 2023, migrated the RehabWorks system to the Cloud and implemented enhancements, such as a caseload management dashboard, an integrated AI virtual assistant for customer communications, and reports streamlining. The final release integrated legacy TxROCS into the ReHabWorks environment.

The project will be assessed on these Business Objectives and Expected Benefits.

Business Objectives and Expected Benefits (What does the project need to accomplish?)	Project Outcome Measures (How will you know you succeeded?)	Outcome Results Timing (When are results available?)
Reduce IT and non-IT consultant/contractor costs for the Agency.	A dedicated contractor database administrator for current VR systems will no longer be required, reducing Agency costs by $194,605 annually.	Contractor can be released at the end of the VR project, once the new system has been put online. Cost savings will start immediately and will be measured and reported in the PIRBO 6 months after project completion.

Business Objectives and Expected Benefits (What does the project need to accomplish?)	Project Outcome Measures (How will you know you succeeded?)	Outcome Results Timing (When are results available?)
Reduce data center services (DCS) costs by decommissioning legacy VR system servers.	VR servers hosted in DCS cost the Agency $16,217 monthly, or $194,605 annually.	Cost savings will be measured starting at the point of VR server decommission within 3 months of project close. Cost savings will be measured and reported in the PIRBO 6 months after project completion.
Reduce costs related to creating and distributing reports.	The cost reduction for the Quarterly 911 report is based on the following reductions in staff time: 50% of 1 Systems Analyst IV @$68,047 annually, 25% of 1 Data Analyst V @ $93,406 annually, and 25% of 1 Data Analyst VI @ $113,022 annually. The is expected to save the Agency a total of $85,630 annually.	Cost savings will start immediately upon system implementation. Cost savings will be measured and reported in the PIRBO 6 months after project completion.
Improve staff efficiency due to a more streamlined and intuitive user interface.	The cost reduction is based on a 5% overall reduction in VR users' time to execute tasks. There are 1753 active VR users. Using an averaged annual salary of $50,065, it will save $4,388,250 annually.	Cost savings will start immediately upon system implementation. Cost savings will be measured and reported in the PIRBO 6 months after project completion.
Reduce training costs due to implementation of a more intuitive VR system.	The cost reduction is estimated at $1M annually.	Cost savings will start after initial training surge is completed. Annual cost savings are not expected to be available for reporting in the PIRBO 6 months after project completion. Savings can be measured at the end of the first anniversary of the implementation date.
Improve efficiency for system users by changing from overnight system updates using batch jobs, to real-time system updates, allowing immediate completion of activities.	The cost reduction is based on 1% reduction in VR users' time to execute tasks. There are 1753 active VR users. Using an averaged annual salary of $40,065, it will save $877,650 annually.	Cost savings will start immediately upon system implementation. Cost savings will be measured and reported in the PIRBO 6 months after project completion.
Reduced staff time to enter data due to reduction of duplicate data entry across systems.	The cost reduction is based on time saved in the creation of 950 purchase orders and 1200 payment vouchers daily. Estimated reduction in time to enter these documents is 30 minutes per document. Based on a salary of $42,511 annually (20.44/hr), The Agency will save $10.22 per record for a total savings of $439,460 annually.	Cost savings will start immediately upon system implementation. Cost savings will be measured and reported in the PIRBO 6 months after project completion.

Who was involved?

Function Stakeholder Representative	Stakeholder Interest
Commission	Project status and prioritization reviewed in quarterly IT Work Sessions and quarterly IT Newsletters.

Business Enterprise Strategic Technology (BEST) Team	The BEST Team determines enterprise business strategy and appropriate application of technology. It ensures that TWC's technology initiatives and proposed projects (regardless of IT Division involvement) help the organization achieve its strategic goals and objectives. The BEST Team is responsible for selecting and prioritizing both strategic and tactical initiatives across the organization, and guiding the effective and cost-efficient application of technology, related personnel resources and funding.
Project Steering Committee	The Project Steering Committee is responsible for ensuring that the project's goals and objectives are met. It is responsible for overseeing progress, resolving issues and managing change control.
Customers (claimants/job seekers)	Individuals who are seeking Vocational Rehabilitation services.
Customers (employers)	Individuals, business, or employer representatives who provide employment opportunities to job seekers.
TWC Staff	Staff in Vocation Rehabilitation Division who coordinate VR services with both job seekers and employers. Representatives will be involved in the design and testing of the revised system.

TWC assigned an organizational change management (OCM) project manager who:

- Developed OCM Plan and obtained necessary approvals and signatures
- Planned OCM schedule and adds to the project work breakdown structure (WBS)
- Guided project participants to follow the OCM Plan
- Executed OCM Plan and Schedule
- Held project participants accountable for compliance with OCM Plan and WBS
- Ensured all planned OCM activities and deliverables were completed by the planned due dates and before the project go-live date

How did you do it?

TWC implemented the project in-house within 24 months using FTEs and contract resources. Project costs were $6,000,000.

The final release for ReHabWorks Renovation project integrated TxROCS into the ReHabWorks environment. The system was staged and ready for production deployment August 31, 2023 and deployed to production with its third release September 15, 2023. For Vocational Rehabilitation staff, the system went live September 18, 2023.

The first two releases of the VRCM project migrated ReHabWorks from servers to the cloud and added enhancements to the case management system, including:

- A dashboard for managing caseloads.
- The integration of the Semi-Autonomous Research Assistant (SARA) system into ReHabWorks for communicating with customers.

- The streamlining of reports.

The successful completion of this project is a major milestone for the Vocational Rehabilitation program. The new system will improve the efficiency and effectiveness of case management, and it will provide a more modern and user-friendly experience for staff and customers.

Impact

What did the project make better?

Supports TWC's Technology Strategy Alignment:
• Goal 1: Increase and support economic potential – Our useful and easy to understand system will help more people.
• Goal 2: Increase customer pathways to services – Our technology is flexible enough to allow customer access to information and services when, where, and how the customer needs it.
• Goal 3: Integrate and align our systems and services – Our systems work together to eliminate duplication, streamline delivery of services, and eliminate the need to support multiple applications and platforms.
• Goal 4: Equip TWC staff and partners with appropriate technology – Our staff and partners have the right tools to provide or oversee delivery of excellent customer service.
• Principle: Explore "buy or build" options, including leveraging existing products, before investing in custom, in-house, or limited-use solutions; consider the data integration requirements for every solution.

Rather than buy a Commercial-off-the-shelf (COTS) software package, the Agency opted to update existing code from Java 8 to Java 11, combine two systems into one, enhance the solution, and move it to the AWS cloud because this approach was less expensive than buying a COTS, hiring a vendor to implement the COTS, and move the solution to a cloud offered by DCS.

The project retired a legacy application by integrating that functionality into the upgraded case management system. The upgraded technology better enables VR to respond in a more agile manner to new and changing business needs of our customers as well as new or evolving federal program requirements and reporting needs.

How do you know?

Business Objectives (What does the project need to accomplish?)	Describe how the project met or did not meet the Expected Benefits	Project Outcome Measures (How will you know you succeeded?)	Actual Results (if too early to collect results, indicate revised date and any revision in estimate)

(1) Reduce total cost of ownership for the Agency.	The Agency met the expected benefits by opting to build the solution with Full Time Equivalents (FTEs) and IT Staff Augmentation Contractors (ITSAC) instead of buying a product and hiring an implementation vendor.	Success will be determined by comparing the actual/projected Total Cost of Ownership (TCO) for the "Build" solution with the estimated TCO for the "Buy" solution and the "Build" TCO cost being less.	TCO for the "Buy" solution was estimated at $57,816,004 and for the "Build Solution was $41,170,027, a savings of $16,654,977. The actual TCO is projected to be $6,834,020 (Actual project cost of $6,000,00 plus DCS cost of $834,020 ($166,804 per year x 5 years).
(2) Reduce data center services (DCS) costs by decommissioning legacy VR system servers.	The project moved all ReHabWorks functionality to the cloud, allowing 6 of the anticipated 7 servers to be de-commissioned.	Success will be determined by verifying that 6 servers were decommissioned and actual DCS costs were reduced.	Before the project, VR servers hosted in DCS cost the Agency $15,215 monthly or $182,586 annually. Post-project, VR servers hosted in DCS cost the Agency $13,900 monthly or $166,804 annually. Post-implementation annual savings is $15,782.

According to VR staff, 1,963 more participant customers than the year prior from the beginning of April 2023 – April 2024 were engaged. VR has increased in the number of customers in Post Secondary Education & Training by 664 and provided an increase of 426 more Pre-Employment Transition Service Delivered.

What now?

The project was successfully implemented on August 31, 2023, and is maintained by TWC staff. New releases to the system are implemented quarterly.

The project supports TWC's mission to promote and support a workforce system that creates value and offers employers, individuals, and communities the opportunity to achieve and sustain economic prosperity. The upgraded technology enables VR to respond in a more agile manner to new and changing business needs of our customers as well as new or evolving federal program requirements and reporting needs.