

**VistA Audit Solution (VAS 2.2)
Deployment, Installation, Back-out, and Rollback
Guide**



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**Department of Veterans Affairs
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Table of Contents

| | | |
|----------|--|----------|
| 1 | Introduction | 1 |
| 1.1 | Purpose | 1 |
| 1.2 | Dependencies..... | 1 |
| 1.3 | Constraints | 1 |
| 2 | Roles and Responsibilities | 1 |
| 3 | Deployment..... | 2 |
| 3.1 | Timeline | 2 |
| 3.2 | Site Readiness Assessment | 3 |
| 3.2.1 | Deployment Topology (Targeted Architecture)..... | 3 |
| 3.2.2 | Site Information (Locations, Deployment Recipients) | 3 |
| 3.2.3 | Site Preparation..... | 3 |
| 3.3 | Resources | 3 |
| 3.3.1 | Facility Specifics..... | 3 |
| 3.3.2 | Hardware | 3 |
| 3.3.3 | Software..... | 3 |
| 3.3.4 | Communications..... | 3 |
| 4 | Installation | 4 |
| 4.1 | Pre-installation and System Requirements | 4 |
| 4.1.1 | Patch Dependencies | 4 |
| 4.2 | Platform Installation and Preparation | 4 |
| 4.3 | Download and Extract Files | 4 |
| 4.4 | Database Creation | 4 |
| 4.5 | Installation Scripts..... | 4 |
| 4.6 | Cron Scripts..... | 5 |
| 4.7 | Access Requirements and Skills Needed for the Installation | 5 |
| 5 | Installation Procedure..... | 5 |
| 5.1 | Installation Verification Procedure | 5 |
| 5.2 | System Configuration | 5 |
| 5.3 | Data Tuning | 5 |
| 6 | Back-out Procedure..... | 5 |
| 7 | Rollback Procedure..... | 5 |
| | Appendix A: Acronyms..... | 6 |

List of Tables

| | |
|--|---|
| Table 1: DIBRG Roles and Responsibilities..... | 1 |
| Table 2: Hardware Requirements | 3 |
| Table 3: Deployment / Installation/ Back-out Checklist | 4 |
| Table 4: Acronym Listing..... | 6 |

1 Introduction

The Veterans Information System and Technology Architecture (VistA) Audit Solution (VAS) is a real-time web-based interface. It provides a nationwide Health Insurance Portability and Accountability Act (HIPAA) compliant Audit Tracking Solution with the ability to track and report on access logs for patients' Personal Identifiable Information (PII)/ Protected Health Information (PHI) data across all VistA instances. VAS end-users are Privacy Officers (PO) and Information Systems Security Officers (ISSO) and their authorized representatives who need the ability to view the log of Create, Read, Update and/or Delete (CRUD) operations on patient information to respond to HIPAA, employee and Inspector General (IG) requests. This data originates from VistA and flows through in-memory database servers to be stored in the Veterans Affairs Enterprise Cloud (VAEC) Amazon Web Services (AWS). The VAS web-based User Interface will access and display the data stored in AWS. Authorized VAS users may view the patient data that was accessed and modified as well as the individual that performed the actions.

1.1 Purpose

The VAS Deployment, Installation, Back-Out, Rollback Guide v2.2 documents the steps and procedures required to deploy and install various components of VAS 2.2.

1.2 Dependencies

There are three dependencies for VAS 2.2:

- Hardware Requirements
- Software Requirements
- Installation of VAS 2.1

1.3 Constraints

To deploy into the target physical environment, installers require the following access:

- A Personal Identity Verification (PIV) card for Authentication
- Zero account access is required for authorization to install and deploy software configuration changes on the systems
- Electronic Permission Access System (ePAS) authorization to the environment
- Secure Shell (SSH) key for environment access

2 Roles and Responsibilities

Table 1: DIBRG Roles and Responsibilities

| Team | Phase/Role | Tasks | Project Phase |
|------|------------|-------|---------------|
|------|------------|-------|---------------|

| | | | |
|---|-----------------|--|------------|
| Veterans Affairs Enterprise Cloud (VAEC) | Deployment | Provides GovCloud support for AWS services | Planning |
| OIT Enterprise Program Management Office (EPMO) | Deployment | Participate in planning meetings, communicate to stakeholders the start/end of deployment and pertinent details of the current status of the System of Systems | Planning |
| VA Office of Information and Technology (OIT), VA OIT Health Product Support, and Project Management Office (PMO) | Deployment | Plan and schedule deployment (including orchestration with vendors) | Planning |
| Local individual Veterans Administration Medical Centers (VAMCs) | Deployment | Determine and document the roles and responsibilities of those involved in the deployment | Planning |
| Field Testing (Initial Operating Capability (IOC)), Health Product Support Testing | Deployment | Test for operational readiness | Completed |
| Health Product Support and Field Operations | Deployment | Execute deployment | Deployment |
| VAMCs | Installation | Plan and schedule installation | Deployment |
| VAS ATO Team | Installation | Obtain authority to operate and that certificate authority security documentation is in place | Deployment |
| VAS Team | Installation | Coordinate knowledge transfer with the team responsible for user training | Deployment |
| VAS Team | Post-Deployment | Hardware, Software, and System Support | Warranty |

3 Deployment

Deployment is planned as a concurrent online rollout. Detailed deployment information for the VAS 2.2 User Interface is located in the Department of Veterans Affairs GitHub repository for VAS. Detailed instructions for creating a new GitHub account and requesting access to the VA organization's GitHub can be reviewed in the VA GitHub Handbook.

WEBS is the VistA namespace assigned for the VAS User Interface (UI). All releases involving the VAS UI will be communicated nationally to VistA sites through the release of informational WEBS patches. The release of VAS 2.2 is being released with patch WEBS*2*3.

3.1 Timeline

The deployment and installation are scheduled to run one day.

3.2 Site Readiness Assessment

The target servers are on-premises machines and VAEC Cloud Virtual Servers or Environment. The site names and locations are listed in section 3.2.2.

3.2.1 Deployment Topology (Targeted Architecture)

The current detailed architecture information for VAS 2.2 is available in the Department of Veterans Affairs GitHub repository for VAS.

3.2.2 Site Information (Locations, Deployment Recipients)

The deployment is taking place at the following data centers:

- AWS

The Initial Operating Capability (IOC) Test Sites are:

- VA Texas Valley Coastal Bend, Harlingen, TX (740)
- James A. Haley Veterans' Hospital, Tampa, FL (673)
- L. McClellan Memorial Veterans Hospital, Little Rock, AR (598)

3.2.3 Site Preparation

No special preparation is required by the site prior to deployment.

3.3 Resources

The list of the resources are as follows: N/A

3.3.1 Facility Specifics

There are no facility-specific features required for deployment.

3.3.2 Hardware

The following table describes hardware specifications required at each site prior to deployment.

Table 2: Hardware Requirements

| Required Hardware | Model | Version | Configuration | Manufacturer | Other |
|-------------------|-------|---------|---------------|--------------|-------|
| | | | | | |
| | | | | | |

3.3.3 Software

Detailed software requirements for VAS 2.2 can be reviewed as part of the README.md file in the VAS GitHub repository.

3.3.4 Communications

Sites participating in IOC field testing will use the “Patch Tracking” Outlook message to communicate with the VAS team, the developers, and product support personnel.

3.3.4.1 Deployment / Installation / Back-out Checklist

The assigned Health Information Governance (HIG) team will deploy the WEBS*2*3 patch. The WEBS*2*3 is an informational patch and it acts as a notice, and therefore, is not installed. Table 3 below is not needed to manually track installation.

Within context of this document, the term back-out pertains to a return to the last known good operational state of the software and appropriate platform settings. This does not apply for VAS 2.2 as the application resides in the Cloud.

Table 3: Deployment / Installation / Back-out Checklist

| Activity | Day | Time | Individual who completed task |
|----------|-----|------|-------------------------------|
| Deploy | N/A | N/A | N/A |
| Install | N/A | N/A | N/A |
| Back-Out | N/A | N/A | N/A |

4 Installation

4.1 Pre-installation and System Requirements

All requirements are available in the Department of Veterans Affairs GitHub repository for VAS (code) Readme folder.

4.1.1 Patch Dependencies

None

4.2 Platform Installation and Preparation

All requirements are available in the Department of Veterans Affairs GitHub repository for VAS (code) Readme folder.

4.3 Download and Extract Files

Actions to download and extract files does not apply to VAS 2.2.

4.4 Database Creation

The required updates utilize an existing VistA database and therefore this section is not applicable.

The details are in the README (Code Repository) in GitHub for VAS .

4.5 Installation Scripts

Any Installation Scripts are in the GitHub repository for VAS.

4.6 Cron Scripts

Any Cron scripts are available in the GitHub repository for VAS.

4.7 Access Requirements and Skills Needed for the Installation

An individual will require access to the National VA Network, Veterans Affairs Organization GitHub access, as well as access to the VAS-Code private GitHub repository.

Additionally, a full-spectrum Developer with advanced knowledge and skills in Knowledge system, Docker Containers, AWS, databases, Apache hypertext server, and Linux system administration is needed for installation. An AWS Administrator is required to resolve any issue for COPY command.

If COPY command error(s) are received, then a ServiceNow (SNOW) ticket will need to be submitted to resolve COPY command error(s).

5 Installation Procedure

See Readme file.

5.1 Installation Verification Procedure

The software is set up and configured in the central enterprise-wide server. Hence, no installation verification is required.

5.2 System Configuration

The individual Microservice configuration is available in the Department of Veterans Affairs GitHub repository for VAS (code).

5.3 Data Tuning

Database Tuning does not apply.

6 Back-out Procedure

Within context of this document, the term back-out pertains to a return to the last known good operational state of the software and appropriate platform settings. This does not apply for VAS 2.2 as the application resides in the Cloud.

7 Rollback Procedure

This section does not apply to VAS 2.2 as the application is in the Cloud.

Appendix A: Acronyms

Table 4: Acronym Listing

| Acronym | Definition |
|---------|---|
| AWS | Amazon Web Services |
| CRUD | Create, Read/Inquire, Update, and Delete |
| DG | Registration package |
| DIBRG | Deployment, Installation, Back-Out, and Rollback Guide |
| ePAS | Electronic Permission Access System |
| EPMO | Enterprise Program Management Office |
| GUI | Graphic User Interface |
| HCS | Healthcare System |
| HIG | Health Information Governance |
| HIPAA | Health Insurance Portability and Accountability Act |
| IG | Inspector General |
| IOC | Initial Operating Capability |
| ISSO | Information System Security Officer |
| MUMPS | Massachusetts General Hospital Utility Multi-Programming System |
| N/A | Not Applicable |
| NPM | National Patch Module |
| OIT | Office of Information & Technology |
| PHI | Protected Health Information |
| PII | Personal Identifiable Information |
| PIV | Personal Identity Verification |
| PMO | Project Management Office |
| PO | Privacy Officer |
| SNOW | ServiceNow |
| SSH | Secure Shell |
| UI | User Interface |

| Acronym | Definition |
|---------|---|
| VA | Department of Veterans Affairs |
| VAEC | Veterans Affairs Enterprise Cloud |
| VAMC | Veterans Administration Medical Center |
| VAS | VistA Audit Solution |
| VistA | Veterans Health Information Systems Technology Architecture |