Centers for Medicare & Medicaid Services

EDGE Server Disaster Recovery Process Job Aid

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Table of Contents

1. Background 1

2. EDGE Server Disaster Recovery Process Overview 1

2.1 Inform CMS of the Disaster Recovery Event 1

2.2 Recreate Server 1

2.2.1 Amazon Web Services (AWS) EDGE Server 1

2.2.2 On-Premise (OP) EDGE Server 1

2.2.3 Server Software Requirements 2

2.2.3.1 Red Hat Enterprise Linux (RHEL) Version 2

2.2.3.2 MySQL Server Version 2

2.2.3.3 Java Version 3

2.3 Backup Restoration 3

2.4 Backup Verification 3

3. Technical Assistance 3

1. Background

CMS has established an External Data Gathering Environment (EDGE) Server Disaster Recovery Process in the event of a disaster or emergency that impacts an issuer's EDGE server. The purpose of this document is to outline the steps that are required to be performed on the EDGE server to assist issuers in resuming data submission and ensuring that the data is included in the risk adjustment (RA) and reinsurance (RI) program calculations. The recovery process requires routine server backup as outlined in the EDGE Server Backup Policy and User Guide for AWS and On-Premise EDGE Servers, Version 1.0 document.

2. EDGE Server Disaster Recovery Process Overview

The steps to restore an EDGE server after a catastrophic event are as follows:

1. Inform the issuer's Financial Management Coordination Center (FMCC) Service Representative in the event of a catastrophic loss of the EDGE server by sending an email to EDGE_Server_Data@cms.hhs.gov.
2. Recreate server.
3. Backup restoration.
4. Backup verification.

2.1 Inform CMS of the Disaster Recovery Event

Issuers must alert their FMCC Service Representative in the event of a catastrophic loss of the EDGE server. The FMCC representative assists issuers with immediate coordination and instructions on how to restore issuers' backup.

2.2 Recreate Server

The FMCC representative will reset the Health Insurance Oversight System (HIOS) Issuer ID so that the existing server can be re-provisioned, upon CMS approval. The following sections explain the process to recreate the EDGE server, depending upon server type:

2.2.1 Amazon Web Services (AWS) EDGE Server

Notify your FMCC representative by emailing EDGE_Server_Data@cms.hhs.gov. A new AWS server will be re-provisioned per FMCC AWS re-provisioning documentation. Issuers may reference the EDGE Server Provisioning Computer Based Test (CBT), provided in the Registration for Technical Assistance Portal (REGTAP) Library.

2.2.2 On-Premise (OP) EDGE Server

Notify your FMCC representative by emailing EDGE_Server_Data@cms.hhs.gov. Issuers should install the new server, per the EDGE Server Provisioning CBT provided in REGTAP. The FMCC representative will provide the following downloads: 'edge.keys', 'edge.properties' and the installation kit. The new OP server will be re-provisioned per the FMCC OP re-provisioning documentation.

2.2.3 Server Software Requirements

During the disaster recovery process, servers (either AWS or OP) should meet the set of software requirements outlined in the following sections before restoring backup files and installing the EDGE application software.

2.2.3.1 Red Hat Enterprise Linux (RHEL) Version

Issuers should install a RHEL version that is 6.5 or 6.7 (recommended).

> **Note:** Issuers who want to install a different version of RHEL should first contact the FMCC representative to ensure it complies with current CMS guidelines and EDGE software.

Execute the following command to confirm RHEL Version:

cat /etc/redhat-release

```
You have new mail in /var/spool/mail/ec2-user
[ec2-user@edgeserver-706201 ~]$ cat /etc/redhat-release
Red Hat Enterprise Linux Server release 6.5 (Santiago)
```

2.2.3.2 MySQL Server Version

Issuers should install MySQL Community Server 5.5.43:

> **Note:** Issuers who want to install a different version of MySQL should first contact their FMCC representative to ensure it complies with current CMS guidelines and EDGE software.

```
Welcome to the MySQL monitor.  Commands end with ; or \g.
Your MySQL connection id is 29417
Server version: 5.5.43 MySQL Community Server (GPL) by Remi

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owners.

Type 'help;' or '\h' for help. Type '\c' to clear the current input statement.

mysql>
```

2.2.3.3 Java Version

Issuers should run the Java Version from the Linux command line to check the Java version. The Java version should be "1.7.0_51"

Note: Issuers who want to run a different version of Java should first contact the FMCC representative to ensure it complies with current CMS guidelines and EDGE software.

```
[ec2-user@edgeserver-706201 ~]$ java -version
java version "1.7.0_51"
Java(TM) SE Runtime Environment (build 1.7.0_51-b13)
Java HotSpot(TM) 64-Bit Server VM (build 24.51-b03, mixed mode)
```

2.3 Backup Restoration

Issuers will work with issuers' assigned FMCC representative for coordination and instructions to restore issuers' backup servers.

2.4 Backup Verification

FMCC representatives will work with the issuer to execute the following series of steps to verify backup and to check if the application is up and running:

1. Verify the software version information,
2. Verify if all databases are restored,
3. Verify database schema information for EDGE SRVR, check if the expected schemas are created and loaded with the data and check the table counts, and
4. Run basic EDGE commands and confirm the application is running.

3. Technical Assistance

CMS requires that issuers notify their FMCC representative that they will be performing this activity. FMCC representatives are available to answer any questions or assist issuers with this procedure. To reach an FMCC representative, issuers should send an email to EDGE_Server_Data@cms.hhs.gov.