Deploying Actifio Resiliency Director for AWS from an AMI

Contents

Preface

The information in this guide is intended for users who are configuring Actifio Resiliency Director for AWS.

Once you have finished configuring Actifio Resiliency Director, consult the Resiliency Director online help. It provides detailed instructions on using Actifio Resiliency Director.

The ActifioNOW Customer Portal

From the customer portal you can obtain detailed reports about your appliance, as well as search the portal's knowledge base for answers to specific questions.

To log into the ActifioNOW customer portal:

1. Go to: **https://now.actifio.com**
2. When prompted, enter the user name and password you received after registering for Actifio Resiliency Director for AWS.

1 Introduction

Actifio Resiliency Director (RD) is an orchestration product that is used to automate disaster recovery for environments using Actifio appliances for backup and replication to a disaster recovery (DR) site or Cloud. RD coordinates with the Actifio appliances to automate the tasks of recovering VMs, physical servers, and their data in the event of a site-wide outage or disaster at the production site or cloud region. RD allows users to pre-configure the most manual or tedious aspects of the recovery, allowing for one-step recovery of all the in-scope servers and data in a repeatable, reliable, and predictable fashion.

Resiliency Director (RD) Cloud Recovery is a single instance of Resiliency Director that allows the enterprises to recover their VMs, physical servers, System State applications, filesystems, and database applications in the cloud environment.

To recover VMs and applications on Amazon Web Services (AWS) cloud, you must add an Amazon Machine Image (AMI) instance of Cloud Recovery in your AWS account. An AMI instance is a template that contains data which includes files to deploy Cloud Recovery on AWS along with VMs, databases, and file systems.

Before adding Cloud Recovery AMI instance, you need to subscribe and launch the Resiliency Director on AWS.

Recovery to cloud

- RD runs in a single cloud instance called RD Cloud, that is used for all configuration and recovery tasks.
- RD Cloud communicates with the AGM-managed Actifio appliances in the production environment but does not need to communicate directly with the source-side appliances.
- RD Cloud initiates recoveries on Actifio appliances in the destination cloud. These appliances may be persistent and hold the replicated data that will be used during recovery, or provisioned as-needed, and retrieve data from the cloud-provided object storage.

2 Deploying the Actifio Resiliency Director AMI

This section assumes that you have an AWS account and is familiar with AWS processes and procedures.

It has the following topics:

Prerequisites

Before you begin, you must have the following information available:

- Your AWS Account Number. This must be shared with your Actifio representative, and they will use it to share the Actifio Resiliency Director (RD) AMI
- The AWS region in which the Actifio RD will reside
- The VPC in which the Actifio RD for AWS AMI will be installed
- The VPC must use either a VPN or Public IP for access.
- If you use a Public IP you must use Elastic IP and have defined a gateway for the VPC

Note: *If you have multiple VPCs, configure your RD for AWS AMI in the VPC that contains most of the applications to be protected. Applications that reside outside of the specified VPC can be protected if you provide a peering connection between VPCs via AWS.*

CPU and Memory Requirements

The following are the CPU and Memory requirements for each Actifio Resiliency Director solution.

- For less than 100 VMs recovery
  - Core (vCPUs): 2
  - RAM: 8 GB
  - Base Partition Size: 49 GB
  - Instance Type: t2.large
- For 100 and more VMs recovery
  - Core (vCPUs): 4
  - RAM: 16 GB
  - Base Partition Size: 49 GB
  - Instance Type: t2.xlarge

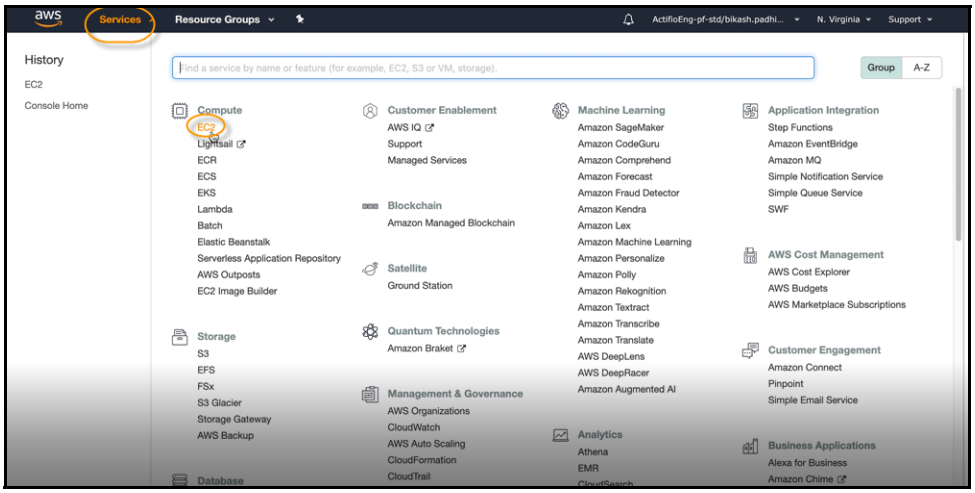
Configuring the Actifio Resiliency Director AMI

After you provide your Actifio representative with the Prerequisites on page 4, your Actifio representative will notify you when the Actifio AMI has been shared to your AWS account.

To configure the Actifio Resiliency Director AMI:

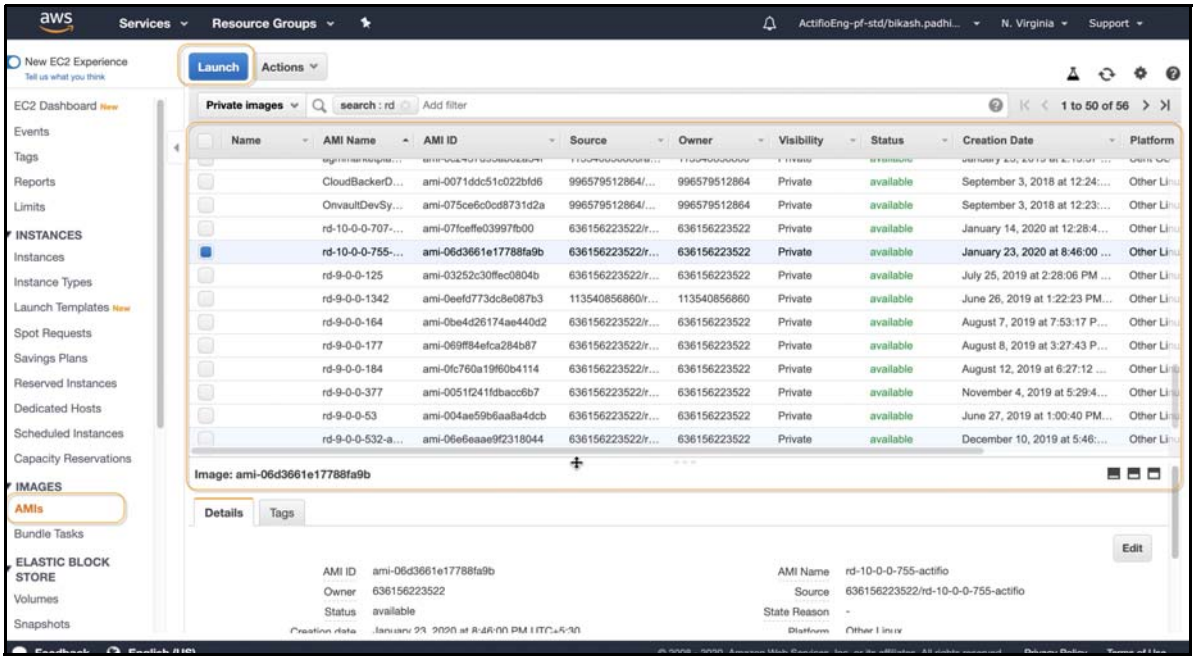
1. Log into your AWS account.
2. Ensure you have selected the correct region in which the AMI is to be installed.

3. From **Services** > **Compute** click **EC2**.

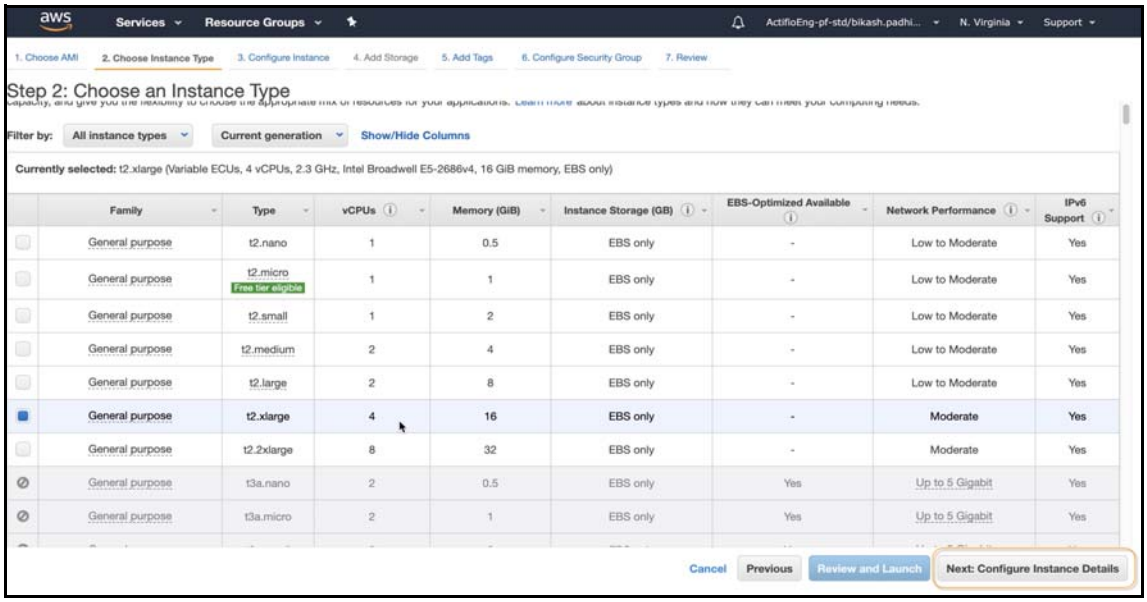


4. From the left navigation menu, under **Images**, click **AMIs** and a list of available AMIs is displayed.

5. Select the Actifio Resiliency Director AMI.

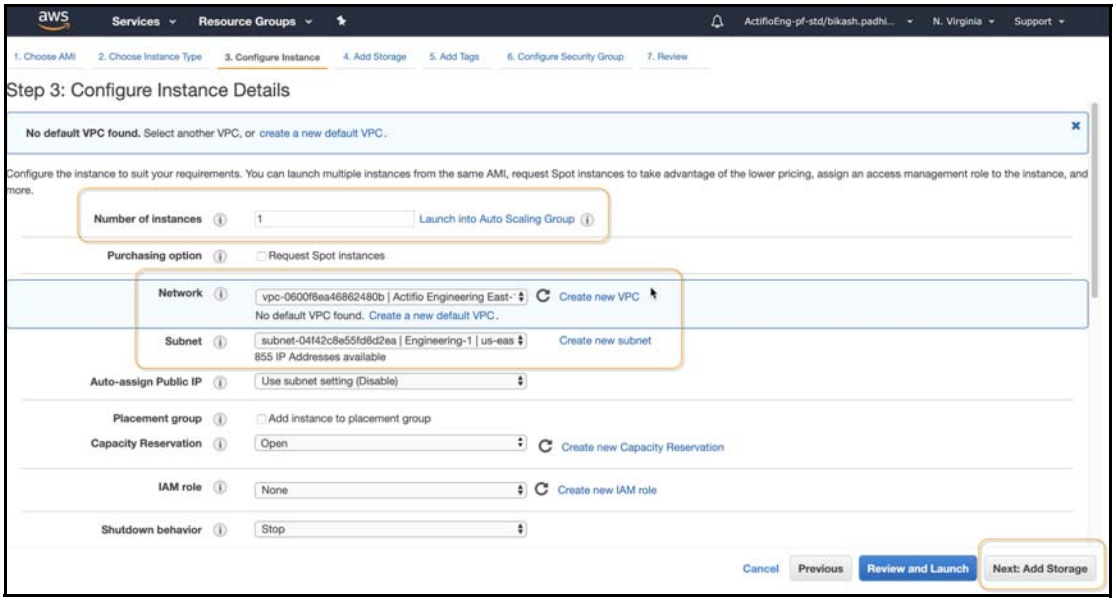


6. Click **Launch** and the Step 2: Choose an Instance Type page is displayed.



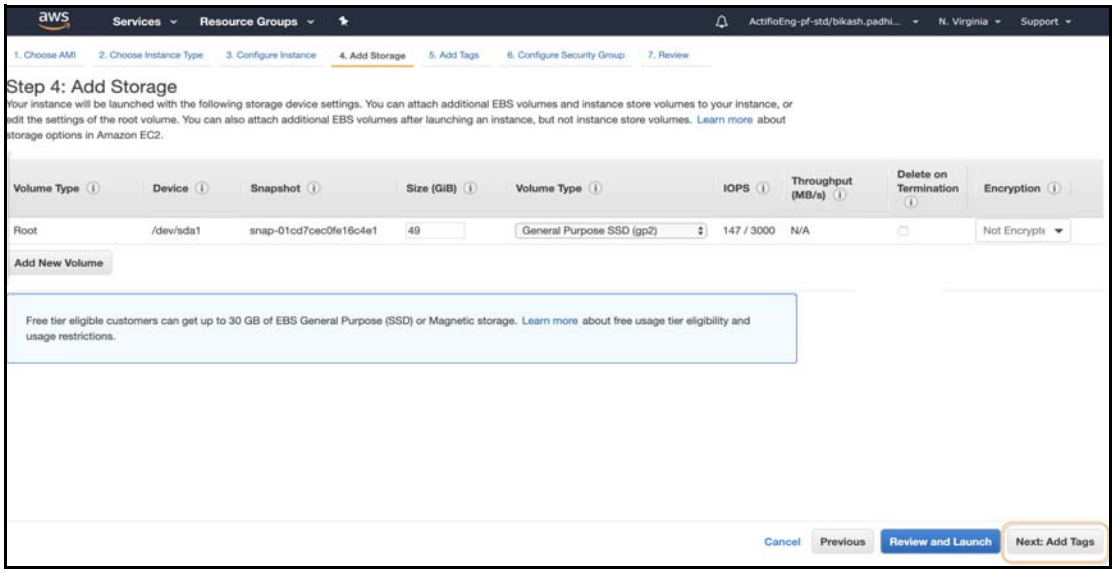
7. From **Choose an Instance Type** page, select the required instance type as below:
   - To recover less than 100 VMs, select the instance type of **t2.large** (2 vCPUs, 8 GB RAM)
   - To recover 100 and more VMs, select the instance type of **t2.xlarge** (4 vCPUs, 16 GB RAM)

8. Click **Next: Configure Instance Details** and the Step 3: Configure Instance Details page is displayed.

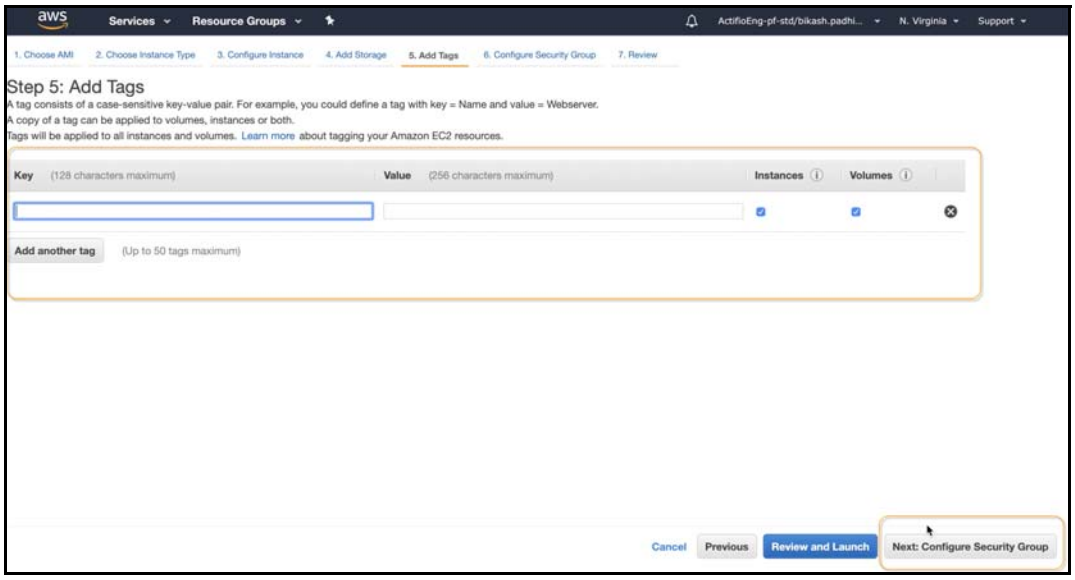


9. In the **Configure Instance Details** page, configure the following:
   - Enter one of the number of instances in the provided field.
   - Select the VPC (network) for the Actifio Resiliency Director instance from the **Network** drop down.
   - Select a default subnet from **Subnet** drop-down.
   - **Auto-assign Public IP:** From the drop down list, select **Enable** if this Actifio Resiliency Director instance requires access via the public Internet. This is not required if your IT infrastructure has a VPN.
10. Click **Next: Add Storage** and the Step 4 Add Storage page is displayed.

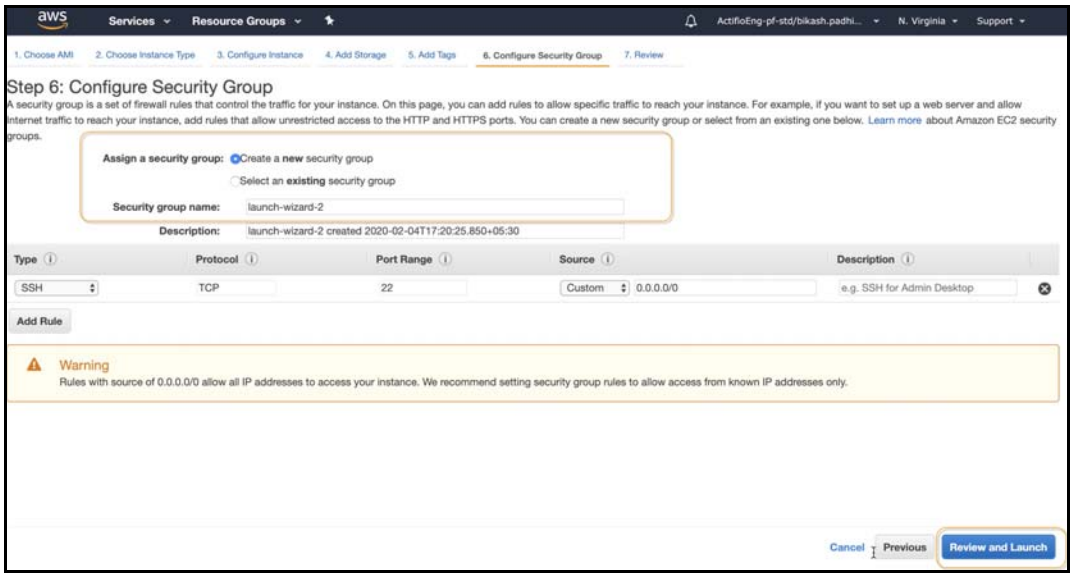
Note: *No more additional storage is required for RD Cloud Recovery.*



11. Click **Next: Tag** and the Step 5 Add Tags page is displayed.



12. In the **Add Tags** page, create a tag for the Actifio Resiliency Director instance that is easy to remember and identify.
    - Enter the key-value pair in the provided fields.
    - Click **Add another tag**, if you want to add more key-pair values.
13. Click **Next: Configure Security Group** and the Step 6 Configure Security Group page is displayed.



14. In **Configure Security Group** page, configure the following fields:
    - From **Assign a security group**, create a new security group or select from an existing group.
    - Enter the **Security group name**.

- Ensure the Security Group is set as follows:

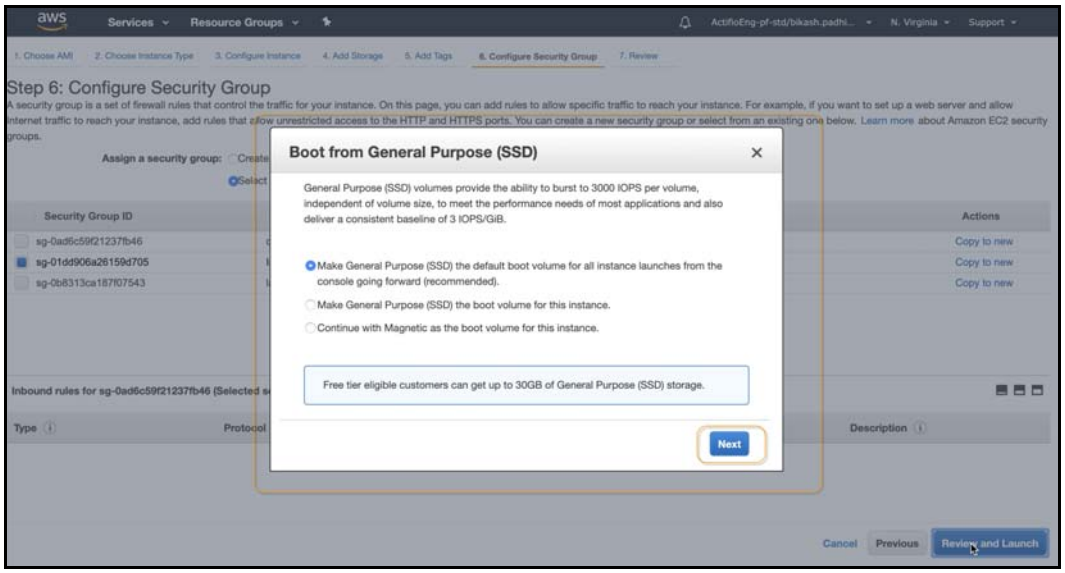
Table 1: Inbound Ports

Type	Protocol	Port Range	Source
SSH	TCP	22	Anywhere
SSH	TCP	26	Anywhere
HTTP	TCP	80	Anywhere
HTTPS	TCP	443	Anywhere

Table 2: Outbound Ports

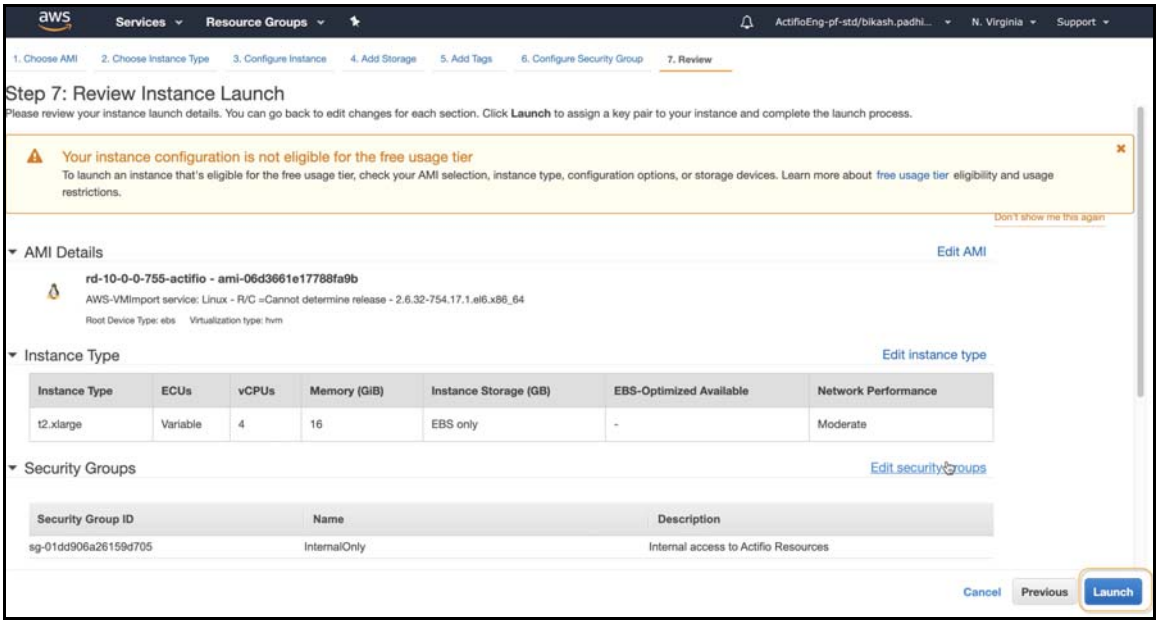
Type	Protocol	Port Range	Target
SSH	TCP	22	Sky Appliance
SSH	TCP	26	Sky Appliance
HTTPS	TCP	443	Sky Appliance, AWS API Endpoint
Adhd tunnel. TCP	TCP	5103	Sky Appliance

- Click **Review and Launch** and the Boot from General Purpose (SSD) pop-up opens.

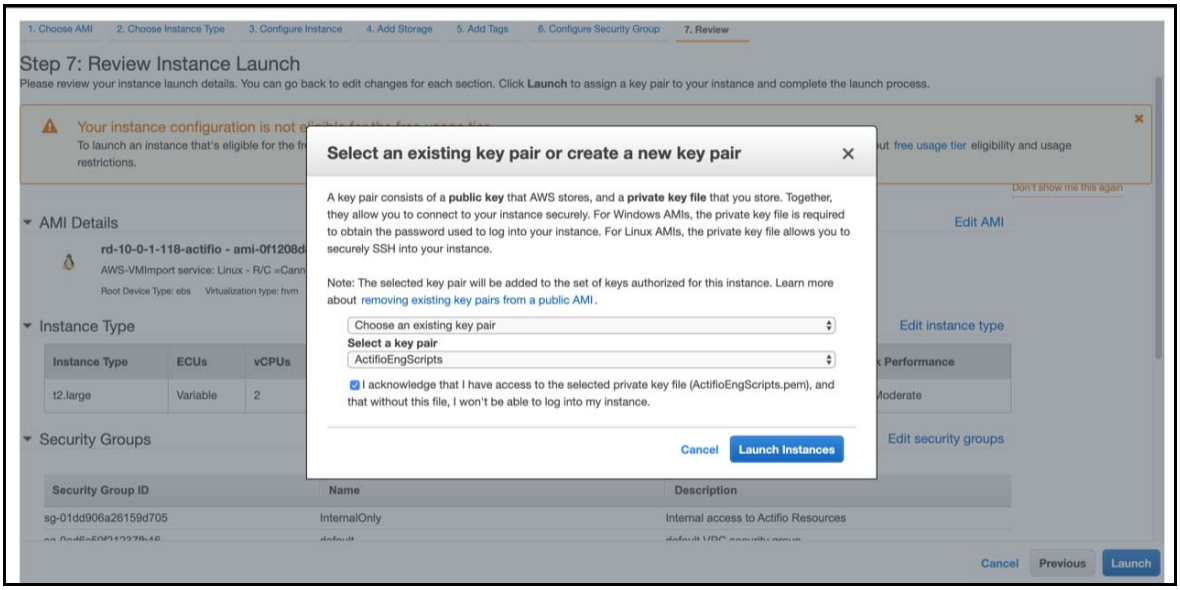


- Click **Next** in the Boot from General Purpose (SSD) page, The Step 7: Review Instance Launch page is displayed.

15. In the **Review Instance Launch** page, review the instance details. If the selections and settings are correct, click **Launch**.

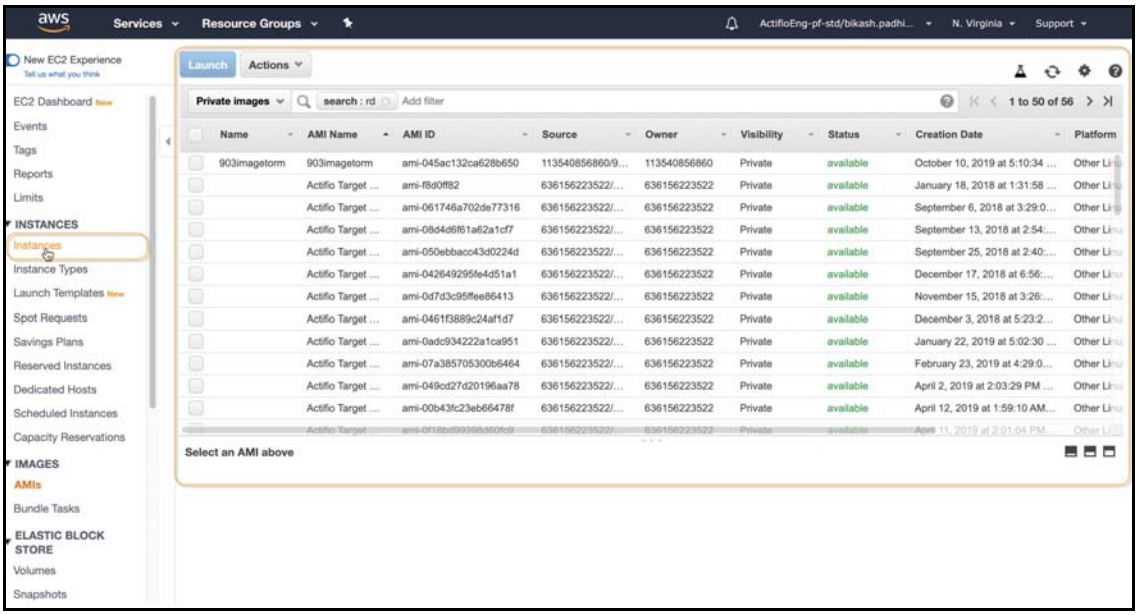


The **Select an existing key pair or create a new key pair** pop-up opens.



16. Select either **Choose an existing key pair** or **Create a new key pair** from the drop-down menu.
17. Select the Acknowledgment check-box to indicate that you will access your selected private key file that is required to log into your instance.
18. If the selections and settings are correct, click **Launch Instance** and the RD for AWS instance is deployed. Select **Cancel** if you want to make any changes to the selections or settings.

The created instance is displayed at the Instance page and you can search the instance with the key tags assigned.

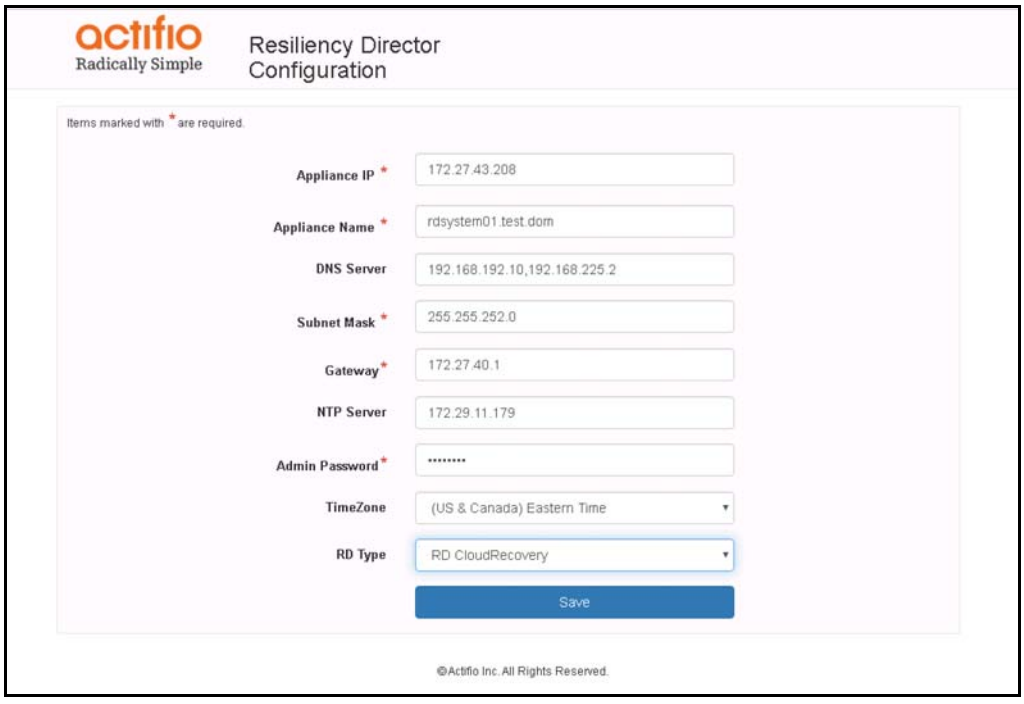


3 Configuring the Resiliency Director Cloud Recovery

When the Actifio Resiliency instance is ready, obtain the instance's desired IP. Once you have the IP you are ready to configure the Actifio Resiliency Director in to the instance.

To configure the Actifio Resiliency Director Cloud Recovery:

1. Open a web browser and enter the URL <https://Actifio Resiliency Director IP Address> to launch the Resiliency Director Configuration page.



2. Change the network parameters to the following values:
   - Enter/verify the static IP address of in **Appliance IP**.
   - Enter the name of Cloud Recovery in **Appliance Name**.
   - Enter the DNS Server IP address in **DNS Server**.
   - Enter the **Subnet Mask** and **Gateway**.
   - Enter the NTP server IP address in **NTP Server**.

- Set the administrator password in **Admin Password**. Use this password to login to the user interface.

Note: *You can change the admin password by using the* `resetuserpasswd` *command.*

- Select the time zone from **TimeZone**.
- Select RD CloudRecovery from **RD Type**.

3. Click **Save**. The server reboots after setting the configuration.

Note: *To modify the network parameters such as IP address, DNS Server, Gateway, Hostname of the Appliance, use* `configsystem` *command.*

Note: *For information on CLI commands, refer the Actifio Resiliency Director CLI guide.*

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4 Accessing the Actifio Resiliency Director Cloud Recovery

This chapter provides the details to log on to the Actifio Resiliency Director Cloud Recovery graphical user interface. You can login to the Actifio Resiliency Director Cloud Recovery graphical user interface using the Resiliency Director administrator credentials.

To access the Actifio Resiliency Director Cloud Recovery home screen:

1. Open a Web browser and use the URL *https://<Actifio Resiliency Director IP Address>* to access the Actifio Resiliency Director Cloud Recovery **Login** page.

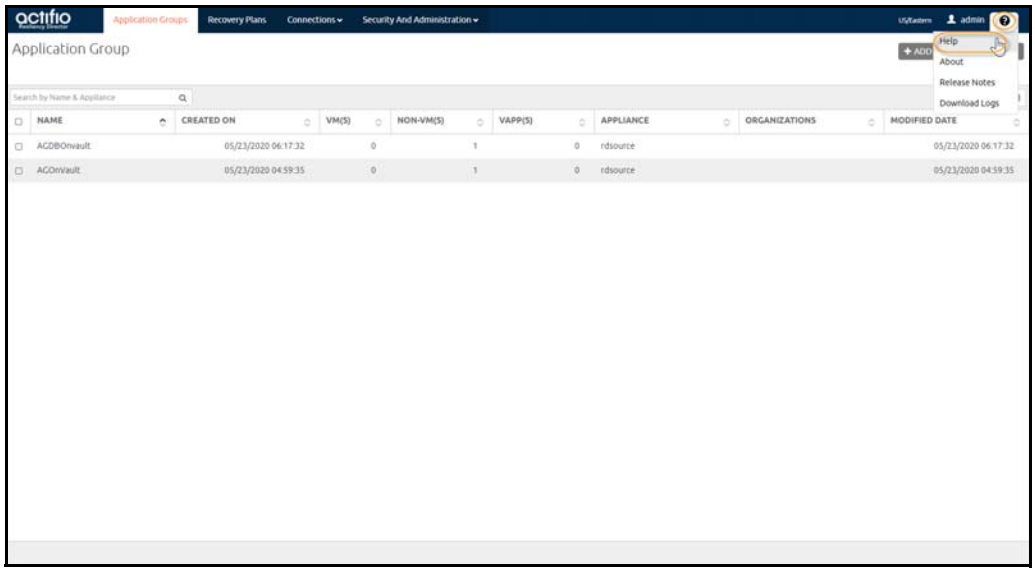
Note: *Use the IP address/hostname of the virtual machine where Resiliency Director Cloud Recovery is running.*

Actifio Resiliency Director Cloud Recovery Login Screen

2. From the Login window, enter the user name as “admin” and the password used during the initial Resiliency Director deployment and installation, then Click **Log In**. The Actifio Resiliency Director Cloud Recovery home screen opens.

Continue with Resiliency Director Configuration

Once successfully logged in, use the Resiliency Directory Online help for guidance on configuring and using Resiliency Director.



Accessing Resiliency Director Online Help