Axcient DAS Transfer Guide

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Introduction

Axcient provides the option of copying backup jobs from an Axcient appliance to a direct attached storage (DAS) device for the following purposes:

1. **Initial Seed DAS** - The initial seed backup of a Cloud backup job can take a substantial amount of time because all data must be copied from the appliance and speed is limited by Internet bandwidth. If the initial Cloud backup will take a long time, and will impede the business productivity, the user has the option of using an Initial Seed DAS for the data transfer from an Axcient appliance to the Axcient Cloud.

   See the Initial Seed DAS section for more information.
2. **Archive DAS** - The Axcient appliance and Cloud provide backup data protection. However, the user has the option of using an Archive DAS as a separate backup archive. In this case, the user can store the Archive DAS in a safe location and restore data from the DAS device as needed through the Axcient appliance.

   See the Archive DAS section for more information.

Notes

- To request a DAS device for either purpose, contact Axcient Support during regular business hours.
- The DAS device hardware is the same for both uses, but the software loaded on the DAS device is specific to its intended use. When contacting Axcient Support, please make sure to specific its intended purpose. An Initial Seed DAS cannot be used as an Archive DAS, and vice versa.
- This document and all other documents referenced in this guide can be found in the Axcient Documentation page.

Initial Seed DAS

This section describes how to copy backup data to the DAS device for the initial Cloud backup to the Axcient Cloud.

Cloud Backup Prerequisites

Only data from backup jobs that are to backup to the Axcient Cloud are copied to the DAS device. Before starting a DAS transfer, verify that all targeted jobs are to set to Cloud backup as follows:

1. Log in to the Unified Management Console (UMC) and click the **devices** tab in the top navigation bar to display the *Devices* screen.
2. Click on a listed device to display the *Backup Jobs* screen, and then select a listed backup job.
3. The *edit backup job* screen appears. Depending on the type of backup job, the backup job should have the following settings:
   - **Image Backup Job** - The *Backup Offsite* box is checked.
   - **File Backup Job** - A solid box appears next to the desired folders and files.

Figure 1 - Image job Offsite setting

Figure 2 - File job Offsite setting
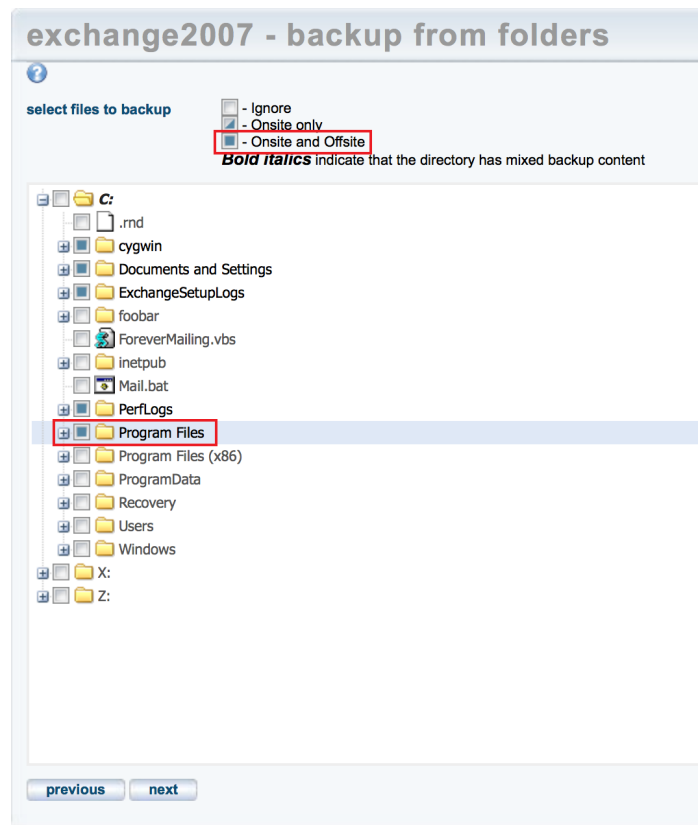
4. If the backup job has not been configured to offsite backup jobs, the user will need to make this configuration and then run the backup job. The user should confirm that the job has completed successfully before continuing.

5. Repeat this procedure for all devices and backup jobs that will be included in the Initial Seed DAS transfer.

6. After verifying all target devices and backup jobs, continue to the Create Initial Seed Backup section.

Create Initial Seed Backup

NOTE: If any issues are encountered, please see the Troubleshooting section for more information.

Note: Port 4243 or 4244 is used for the offsite backup during the initial seed process to an Axcient data center. These ports must be opened until the seeding is complete. Otherwise, the offsite backups during this period will fail.

The user will need to open the packing and place the DAS device next to the target Axcient appliance. Once this is done, take the following steps to create an initial seed backup using a DAS device:

1. Connect the USB and power cables to the DAS device. See the figures below for reference as to the locations of the USB and power ports on the various DAS form factors:

    - ❶ signifies the power connector.

    - ❷ signifies the USB connector.

Figure 3 - 3TB DAS Devices

Figure 4 - 8TB DAS Device

Figure 5 - 12TB DAS Device (small)

Figure 6 - 12TB DAS Device (large)

Notes

- Make sure there is ventilation space around the DAS device to protect it from overheating.
- The larger RAID models require an external power supply which will come with the device. Connect the DAS device to the power supply, and the power supply to a power outlet.
- The 3TB model will power on automatically once the power is plugged in. The remaining RAID models all have power on/off switches with three settings (on/auto/off). Make sure that these are set to the **on** position.
- The RAID models have status lights above each drive. The user may see the following status lights:
  - **Solid Blue** - Functional but inactive.
  - **Blinking Blue** - Functional and active.
  - **Blinking Red** - RAID array is being rebuilt.
  - **Solid Red** - A bad drive.
- The RAID model drives are Axcient specific. **DO NOT** remove or replace them. Contact Axcient Support if there are any issues.

2. The DAS device comes with a USB cable. Connect the USB cable from the USB port on the DAS device to one of the USB ports on the Axcient appliance.

Figure 7 - Location of USB powers on tower appliances
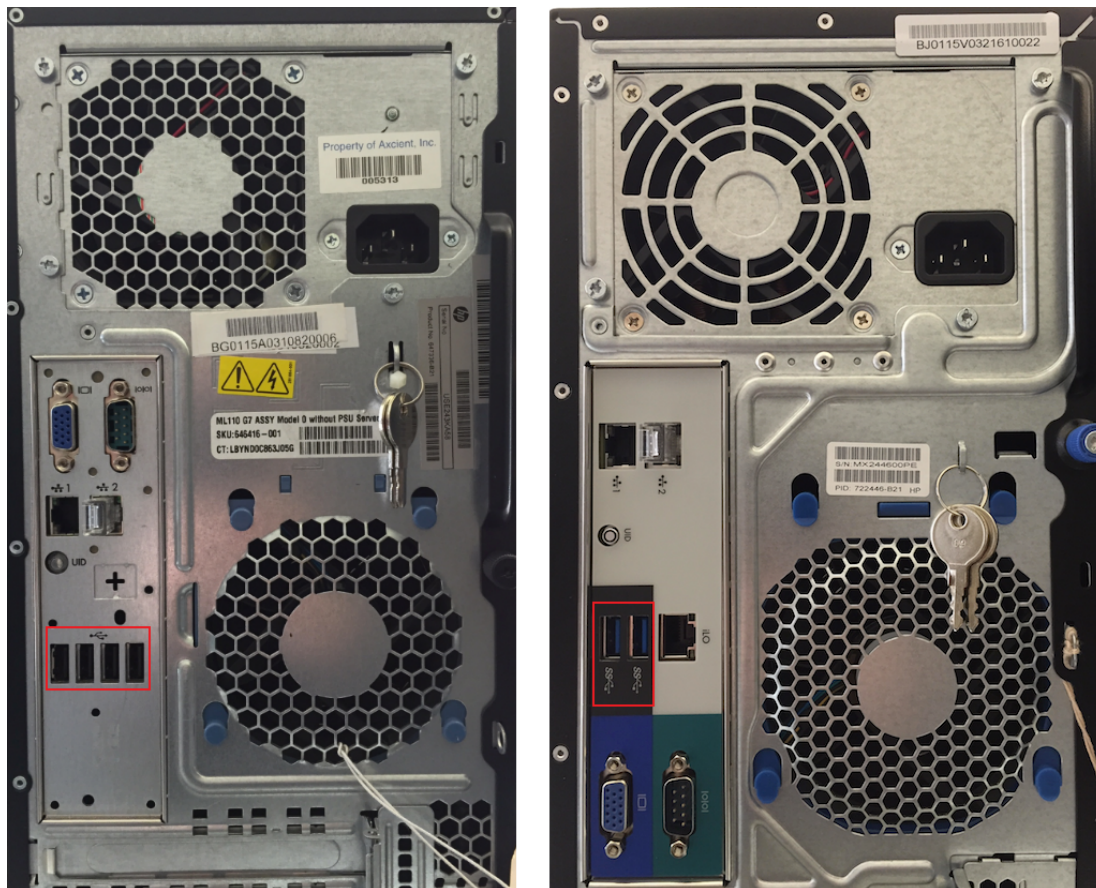
Figure 8 - Location of USB ports on 1U appliances
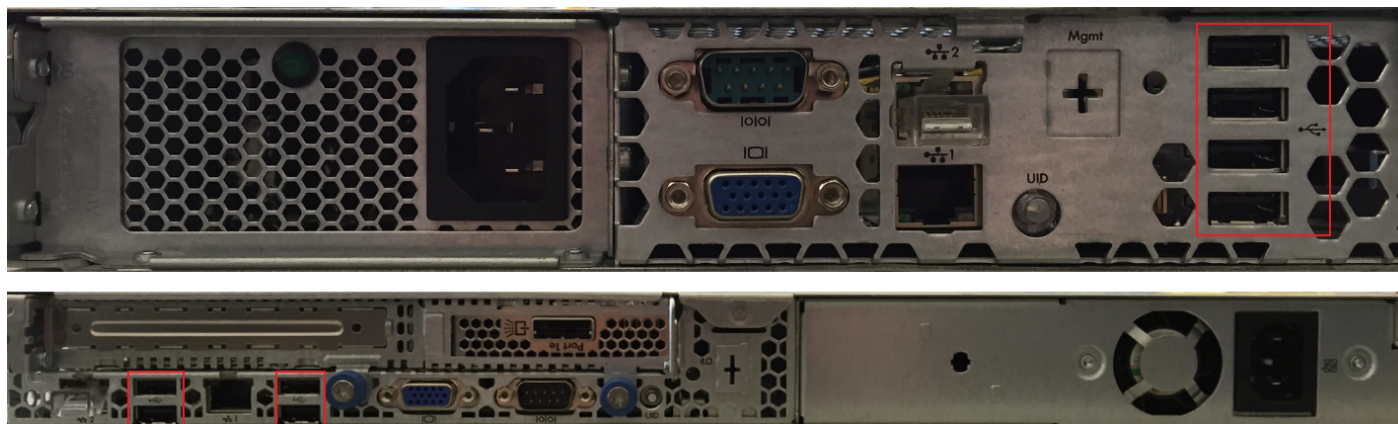
Figure 9 - Locatin of USB ports on 2U appliances

3. Log in to the Unified Management Console (UMC) of the target appliance and click the **options** button in the top-right menu.

Figure 10 - Location of options button

4. The *Options* screen will appear. In the *Copy to Removable Drive for Offsite* section, do the following:
    a. Review the list of backup jobs under *The following backup jobs will be included in the offsite backup* section, do the following:
        - If this list is correct, skip to *step C*.
        - If this list is empty or incomplete, continue to *step B*.
    b. Review the list of backup jobs under *The following are onsite-only backup jobs and therefore will not be included in the offsite backup* section. If the user wants any of these jobs to be included in the offsite backup, the job definition must first be modified as per the instructions in the Initial Seed DAS section.
    c. Click the **Start** button. A popup window appears to verify the DAS copy command. Click **OK** to confirm.

Figure 11 - Options Screen: Offsite Backup section

copy to removable drive for offsite

The following backup jobs will be included in the offsite backup:

Offsite Schedule Name
99.11 FF 1
twaxdev test-file1
99.11 foobar

The following are onsite-only backup jobs* and therefore will not be included in the offsite backup:

Onsite Schedule Name
Exchange Mailboxes
77.199 Pub Folders and User1
Pub Fldr only
99.11 Image
99.21 Image

Note*: To modify a backup job to become onsite/offsite please see the help link: ❓

Enable copy of offsite files to an external DAS drive:

[mount drive] [start] [cancel] [prepare drive to disconnect]

Copy Progress

Notes

- The **Start** button is not enabled (appears gray) if the export drive is not connect. If it is connected but not mounted, click the **mount drive** button.
- Mixed file backup jobs (jobs in which files are set for both onsite and offsite, as well as only onsite) appear in the offsite backup list.

5. The copy process will begin. The *Copy Progress* bar indicates the current status. When the transfer is complete, a pop-up window appears with a success message. Click **OK**.

6. Once the copy has completed successfully, click the **prepare drive to disconnect** button. Once this button is clicked, the user can disconnect the DAS from the Axcient appliance.

7. Using the same packaging material, repackage the DAS and send it back to Axcient using the included return mailing label. See the DAS related email from Axcient Support for any additional information.

CAUTION! Do not disconnect the DAS device before the success message appears. Otherwise, the Axcient appliance could hang and be left in an unstable state. The user can cancel the DAS copy prior to completion by clicking the **cancel** button. However, the copy starts over from the beginning if restarted after canceling.

Note: Data copied to a DAS device used for the initial offsite backup is encrypted to ensure security during transport the Axcient data center (where it is also encrypted).

Archive DAS

This section describes how to copy backup data from the Axcient appliance to an Archive DAS as a separate archive, which can be used to restore data to another device at a later date.

Create Backup on Archive Drive

NOTE: If any issues are encountered, please see the Troubleshooting section for more information.

To copy backup jobs to an Archive DAS, do the following:

1. Connect the Archive DAS to the Axcient appliance. See Steps 1 through 3 in the Create Initial Seed Backup section for further instructions on how to do this.
2. Log in to the UMC of the target appliance and click the **options** button in the top-right menu.
3. The *Options* screen will appear. In the *Export to removable drive* section, do the following:
    a. Under the *Exportable Jobs* section, check the box next to each backup job to be achieved to the Archive DAS. Only image and file jobs can be selected.
    b. Under the Export Options section, choose one of the following options:
        - **Export selected jobs** - Select this options to copy/overwrite the selected jobs to the Archive DAS. This overwrites any existing data of the same name already on the Archive DAS. Existing jobs with different names will not be affected.
        - **Export selected jobs (no retention pruning)** - Select this option to copy/append the selected jobs to the export drive Jobs already on the export drive are updated to match the appliance version except that restore points which are pruned on the appliance but still exist on the Archive DAS are not deleted.
        - **Clear all existing data and then export selected jobs** - Select this option to first delete all existing data from the Archive DAS and then to copy the selected jobs to the Archive DAS. If no jobs are selected, this option will delete all existing data on the Archive DAS.
    c. Click the **Start** button. A popup window appears to verify the copy command. Click **OK** to continue.

Figure 12 - Options Screen: Export Drive Selection

4. The copy process will begin. The *Export Progress* bar indicates the current status. When the transfer is complete, a popup window appears with a success message. Click **OK**.
5. When the copy is complete, do the following:
   a. Click the **prepare drive to disconnect** button.
   b. Disconnect the export drive and store it in a safe location.

CAUTION! Do not disconnect the DAS devie before the success message appears. Otherwise, the Axcient appliance could hang and be left in an unstable state. The user can cancel the DAS copy prior to completion by clicking the **cancel** button. However, the copy starts over from the beginng if restarted after canceling.

Note: Data copied to an Archive DAS is not encrypted (unlike data cpied to an Initial Seed DAS device).

Troubleshooting

If an error occurs during the DAS transfer process, check the event log for DAS-related events. See the Axcient Error Messages Manual for more information about DAS events messages.

Figure 13 - DAS Event Messages

User	Date	Action	Entity	Details
UBS	05/12/2009 - 12:43:17 PM	OffsiteCopy: SUCCESS - Offsite files have been copied to DAS device	UBS	View
UBS	05/12/2009 - 12:43:17 PM	OffsiteCopy: Ummounting DAS device	UBS	View
UBS	05/12/2009 - 12:43:17 PM	OffsiteCopy: DAS device has been unmounted	UBS	View
UBS	05/12/2009 - 12:43:15 PM	SchedulerOffsiteCopy: offsitecopy is starting..	UBS	View
UBS	05/12/2009 - 12:43:15 PM	OffsiteCopy: Beginning copy process...	UBS	View
UBS	05/12/2009 - 12:43:15 PM	OffsiteCopy: Beginning copy process: cp -aLu /uptiva/offsite/ /mnt/ax/das/	UBS	View
UBS	05/12/2009 - 12:41:03 PM	OffsiteCopy: Copy button is enabled and DAS is mounted	UBS	View
admin	05/12/2009 - 12:39:00 PM	login	USER	View

Check the following if the DAS device is not working properly:

1. Check the power cord and verify it is plugged in to a working power socket. If an 8TB or 12TB DAS device is being used, make sure that the power supply box and connector cord are securely connected.
2. Check the USB cable connection between the DAS device and the appliance. If the USB cable is connected properly, try using a different USB port.
3. Check for sound. The user should be able to hear activity or feel mild vibrations as the disks begin to spin.
4. If the user hears a scratching or skipping sound, or the user cannot feel or hear any activity, contact Axcient Support and request a new DAS device. Please provide the asset tag number of the non-working DAS unit when contact Axcient Support.

Restore From Archive DAS

Note: Data can be restored using any Axcient appliance, not just the original one

To restore data from an Archive DAS to another device, do the following:

1. Connect the Archive DAS to an Axcient appliance.
2. Log in to the UMC and click on the **devices** tab in the top navigation bar.
3. The *Devices* screen appears. When the export drive is connected to the appliance, an *export drive* section will appear listing the connect Archive DAS. Click the icon of the target Archive DAS.

Figure 14 - Device Screen
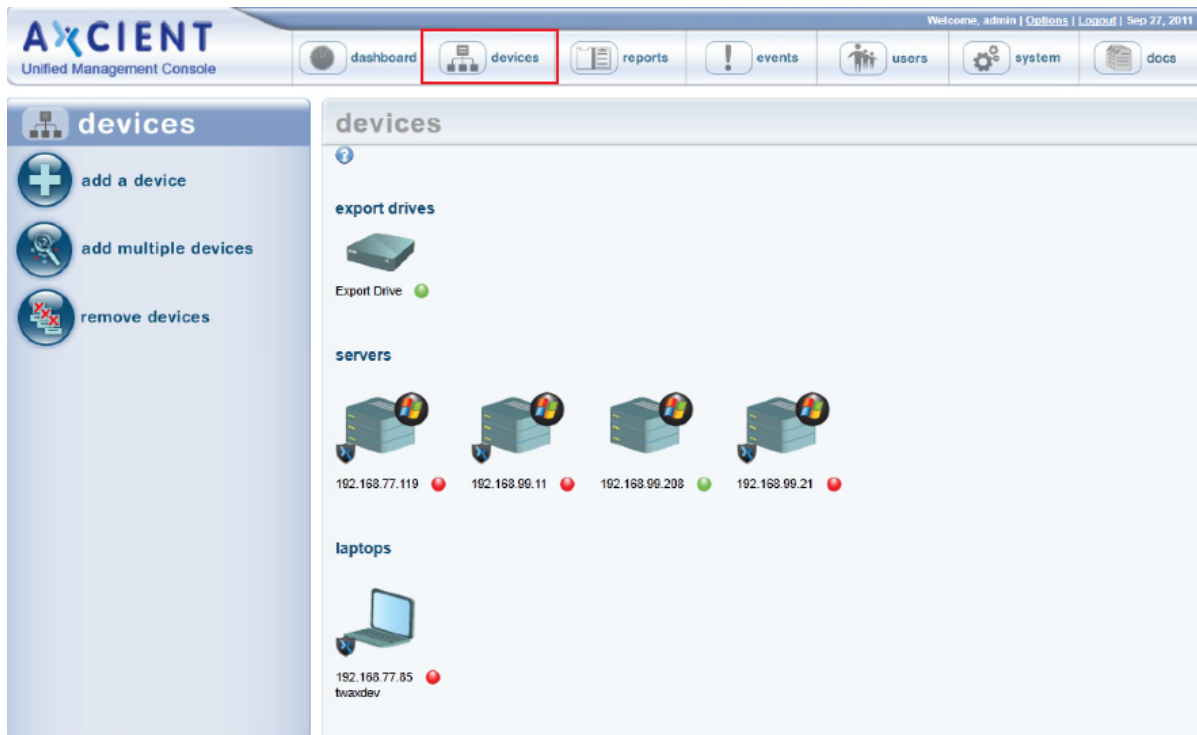
4. The *Backup Jobs* screen for the Archive DAS appears. Click on the target job name. Job names appear in the following formart:

   device name: job name

   device name is either the device alias or the IP address, or host name of the device.
5. The detail screen for that backup job appears. The user can now restore data from the backup job.

Note: Backup jobs on the Archive DAS are not copied to the Axcient appliance. The appliance is simply a conduit through which the transfer takes place between the Archive DAS and the target device.