

Recovery Without Import

REPLICATING OR COPYING NETBACKUP IMAGE CATALOGS

A quick and safe method for moving VERITAS NetBackup™ catalogs
to another NetBackup recovery site

October 30, 2003

OVERVIEW

This document establishes a quick and safe procedure to move VERITAS NetBackup™ catalogs and tapes to another NetBackup site for recovery or DR purposes. This procedure is quicker because the catalog files are copied from one server to another vs. having to recreate them (i.e. import each piece of media) at the recovery site – a potentially long process.

This procedure assumes that the receiving site has a fully functioning NetBackup master server and there is sufficient bandwidth to copy the NetBackup catalog files from one site to another. If this procedure is being used as part of an overall DR plan, there are many other steps that are required and which must be addressed. This procedure is only intended to allow tapes to be moved between master servers.

BACKGROUND

There are many different ways to recover data on a different master than the one used for the original backups. Several of these methods are documented by consulting and one, catalog replication using VERITAS Volume Replicator™ (VVR) software, is being formalized in the near future (i.e. a target GA date of: Q1, 2004). This document will give a specific procedure to follow along with the restrictions and caveats. This should allow customers to accomplish their goals in a manner that will be safe, reliable and supported.

PROCEDURE

This procedure should be used if data is being moved from one active NetBackup domain to another for recovery or Disaster Recovery purposes only. You must follow all the restrictions and caveats.

Note: The NetBackup master server in the originating site will be referred to as the Primary Site and the NetBackup master server in the recovery site will be referred to as the Recovery Site.

RESTRICTIONS

1. All tapes being moved must have unique barcodes.
2. All client names must be unique.
3. None of the tapes being moved will be used for backups at Recovery Site.
4. There exists a library at the new location to support the correct tape format.
5. Both masters must be running the same release of NetBackup software.
6. Both masters must be similar architecture (e.g. both UNIX or both Windows).

CAVEATS AND HELP

This procedure assumes you will not be using the moved tapes for backups in the Recovery Site, as it does not move the NetBackup volume or media databases. If these tapes are returned to the Primary Site, the image directory on the Recovery Site will not be gracefully cleaned up. When the image or images expire they will be deleted from the image directory but there will be an error logged in the bptm log that states *could not find media id xxxxxx in database, nothing to delete*. To address this problem...

- Delete the images from the catalog after the restores are finished and the tapes are removed.
 - When you eject the tapes you should also consider removing the entries from the volume database.
- If you want to permanently move the tapes and images then you are looking at a master merge which is a documented service offered by VERITAS Enterprise Consulting Services.

To manage this process more efficiently, ensure the policies are correctly configured on the Primary NetBackup master server. Some things to consider are:

- Ensuring the target backups are not multiplexed so only the desired images are sent offsite
- Directing the target backups to a specific unique volume pool should be done to make it easier to identify and track the required media. This will also ensure only the desired images are taken offsite.

- If the Primary NetBackup master server has multiple storage units it would be easiest to define this special volume pool on one storage unit.
 - Another way to achieve this would be to duplicate the images that are going to be sent to the new location using either NetBackup Vault or bpduplicate and directing the duplicate images to a special volume pool.

Careful planning in the configuration at the originating site can make this process work more smoothly.

PROCEDURE

Note: The NetBackup master server in the originating site will be referred to as the Primary Site and the NetBackup master server in the recovery site will be referred to as the Recovery Site.

1. Perform a catalog backup on both masters. This will allow you to recover from any errors that might occur during this process.

On the Recovery Site, perform the following steps:

2. Configure a special volume pool that will never be used for normal backups.
3. Setup barcode rules for the incoming tapes to put them in the special volume pool.

On the Primary Site, perform the following steps:

4. Ensure there are no active backups for the desired clients. One way to ensure this is to stop the NetBackup services/daemons on the master server.
5. Copy the desired client directories at the originating site. This would be the contents of /usr/openv/netbackup/db/images/<client name> on UNIX master servers or \Program Files\VERITAS\netbackup\db\images\<client name> on Windows master servers.
6. You can now move the client data (tapes) and catalog data to the new site.

On the Recovery Site, perform the following steps:

7. Merge the copied images into the catalog.
8. Insert the tapes in the library
 - a. Note: To ensure none of the moved tapes can be overwritten you might want to write protect them.
9. Inventory the robot containing the moved tapes.
10. Insert the appropriate FORCE_RESTORE_MEDIA_SERVER entry or entries in bp.conf. When you insert this entry in bp.conf you will need to recycle bprd. This can be done from the General Server tab in the master server host properties on UNIX or Windows.
11. If you moved primary copies of the tapes, then you are ready to restore. If you moved non-primary tapes then you will need to change the primary copy for all the images being moved.