

Step-by-Step Guide

How to Backup your data residing on Open-E DSS V7 to iSCSI Target Volume over a LAN

Software Version: DSS ver. 7.00 up56

Presentation updated: March 2016

Sample Configuration

This document will explain how to Backup to a remote iSCSI Target Volume over the LAN. Two DSS V7 systems are required with RAID Arrays.

Backing up to an iSCSI Target Volume over the LAN uses two of the features built into the Open-E DSS V7:

- Local Backup (as a remote iSCSI Target is used for the backup destination, the backup data saved in remote server),
- Restore.

An example of the configuration:

- First Array RAID on the DSS1 is for live data on **volume group DATA** (vg00),
- Second RAID Array on DSS2 is for backup as **volume group BACKUP** (vg01) configure on the iSCSI Target Volume.

Setup Backup :

- ✓ Backup schedule is set every day with a 8 weeks retention time for “DATA” share.

- **Recommended Resources**

- Hardware (two systems requires):

- ✓ x86 compatible
 - ✓ RAID Controller
 - ✓ HDD's
 - ✓ Network Interface Cards

- Software

- ✓ Two Open-E DSS V7
 - ✓ Backup functions are built in the Open-E DSS V7 (without additional requirements of hardware)

- **Benefits**

- Data Redundancy over a LAN

To set up backup to iSCSI Target Volume over a LAN, perform the following steps:

1. Hardware configuration (see the next slide)
2. Configure Destination Node:
 - Create a Volume Group, iSCSI volume and target on the DSS2,
3. Connect iSCSI target Volume using iSCSI Initiator
 - On DSS 1, connect iSCSI target Volume from DSS2 using iSCSI Initiator on DSS1
4. Configure the Local Backup (on Source Node)
 - Create two Volume Groups (vg00 and vg01) on DSS1
 - Create NAS volume and snapshot,
 - Enable Local backup function
 - Create Backup Task with Shedule
5. Create the Restore from Backup

Backup to an iSCSI Target Volume over a LAN

1. Hardware configuration

Data Server (DSS1)

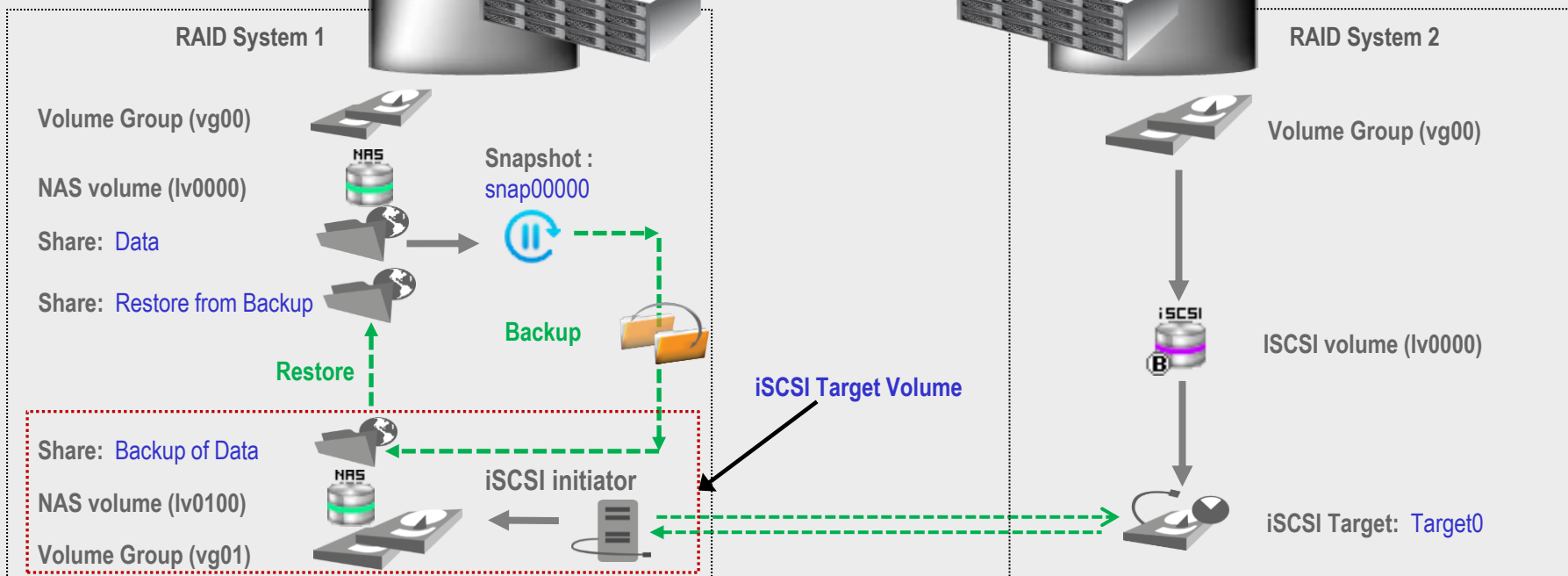
Source node

IP Address: 192.168.0.220

Data Server (DSS2)

Destination node

Address IP: 192.168.0.240



Backup to an iSCSI Target Volume over a LAN



Data Server (DSS2)
Destination node
IP Address:192.168.0.240

2. Configure Destination Node

Under the "CONFIGURATION" tab, select "Volume manager" and next "Volume groups"

In the Unit manager add the selected physical units (Unit S001) to create a new volume group (in this case, vg00) and click **apply** button.

The screenshot shows the open-e web interface with the following elements:

- Header: open-e ENTERPRISE CLASS STORAGE OS for EVERY BUSINESS DATA STORAGE SOFTWARE V7
- Navigation tabs: SETUP, CONFIGURATION, MAINTENANCE, STATUS, HELP
- Breadcrumbs: You are here: Configuration > Volume manager > Volume groups
- Left sidebar: Vol. groups (selected), Vol. replication
- Main content area:
 - Unit manager** table:

Unit	Size (GB)	Serial number	Status
<input checked="" type="checkbox"/> Unit S001	298.10	N/A	available

Action: new volume group (dropdown)
Name: vg00 (input field)
[apply button]

Please apply changes or press "reload" button to discard
 - Drive identifier** table:

Unit	Serial number	Status
<input type="checkbox"/> Unit S000	9SY0QWBT	
<input type="checkbox"/> Unit S001	9RA6VDG3	

[apply button]

Event Viewer and footer: Data Storage Software V7 - All rights reserved

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS2)
Destination node
IP Address:192.168.0.240

2. ... Continue

Select the volume group (**vg00**) from the list on the left. In Action select a new iSCSI volume. This logical volume will be the destination of the backup process.

Next , select the required size of iSCSI volume. In this e.g. adding 250 GB for the iSCSI volume.

After assigning an appropriate amount of space for the iSCSI volume, click **apply** button.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Configuration > Volume manager > Volume groups > vg00

Vol. groups

- vg00

Vol. replication

Volume manager

System volumes	Size (GB)
SWAP	4.00
Reserved for snapshots	0.00
Reserved for system	4.00
Reserved for replication	0.00
Free	290.06

Action: new iSCSI volume

Options: Just create volume

Use volume replication

File I/O

Initialize

Rate: medium

Block I/O

0 290.06

add: 250 GB

apply

Please apply changes or press "reload" button to discard

★ Event Viewer

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS2)
Destination node
IP Address:192.168.0.240

2. ... Continue

The destination iSCSI Volume Block I/O is now configured.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Configuration > Volume manager > Volume groups > vg00

Vol. groups [gear] [?] [red dot] vg00

Vol. replication [gear] [?]

Volume manager [refresh] [?] [info]

Info
Logical volume lv0000 has been created successfully.

Logical Volume	Type	Snap.	Rep.	Init.	Blocksize (bytes)	Size (GB)	
lv0000	iSCSI				N/A	250.00	[trash]
System volumes						Size (GB)	
SWAP						4.00	[trash]
Reserved for snapshots						0.00	
Reserved for system						4.00	
Reserved for replication						0.00	
Free						40.06	

Action: new NAS volume [dropdown]

Use volume replication

WORM

0 [slider] 40.06

< > add: 0.00 GB

apply

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS2)
Destination node
IP Address:192.168.0.240

2. ... Continue

Choose "CONFIGURATION", "iSCSI target manager" and "Targets" from the menu.

In the Create new target, click the **apply** to confirm.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Configuration > iSCSI target manager > Targets

Targets

Create new target

Target Default Name

Name:

Alias:

apply

Discovery CHAP user access

No discovery CHAP user access authentication

Enable discovery CHAP user access authentication

apply

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Backup to an iSCSI Target Volume over a LAN



open-e
Data Server (DSS2)
Destination node
IP Address:192.168.0.240

2. ... Continue

Select target0 within the "Targets" field.

To assign a volume to the target, click the **attach** located under Action.

The screenshot shows the open-e web interface for configuring an iSCSI target. The breadcrumb trail is: Configuration > iSCSI target manager > Targets > iqn.2016-03:dss2.target0 (target0). The "Targets" section lists "target0". The "Target volume manager" section shows "No logical volumes attached to this target." and a table of "Available logical volumes" with one entry: Volume "lv0000", Type "iSCSI", SCSI ID "jVpJYKQLNxpBu26g", LUN "0", Access mode "write-through", and an "attach" button. The "CHAP user access authentication" section has radio buttons for "No CHAP user access authentication" (selected) and "Enable CHAP user access authentication". An "apply" button is at the bottom right.

Volume	Type	SCSI ID	LUN	Access mode	Action
lv0000	iSCSI	jVpJYKQLNxpBu26g	0	write-through	attach

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS2)
Destination node
IP Address:192.168.0.240

2. ... Continue

The destination iSCSI target is now configured.

The screenshot shows the open-e web interface for configuring an iSCSI target. The breadcrumb trail is: Configuration > iSCSI target manager > Targets > iqn.2016-03:dss2.target0 (target0). The 'Targets' section shows a single target named 'target0'. The 'Target volume manager' section contains an 'Info' box with a warning about LUN 0, a table of logical volumes attached to the target, and a section for available logical volumes. The 'CHAP user access authentication' section has two radio buttons: 'No CHAP user access authentication' (selected) and 'Enable CHAP user access authentication'. An 'apply' button is at the bottom right.

Volume	Type	SCSI ID	LUN	Access mode	Action
lv0000	iSCSI	jVpJYKQLNxpBu26g	0	write-through	detach

Volume	Type	SCSI ID	LUN	Access mode	Action
No logical volumes available.					

No CHAP user access authentication
 Enable CHAP user access authentication

apply

Backup to an iSCSI Target Volume over a LAN



open-e

Data Server (DSS1)
Source node
IP Address:192.168.0.220

3. Connecting iSCSI target Volume using iSCSI Initiator

Choose "SETUP", "iSCSI initiators". In Add new portal server, in field Portal IP enter IP Address of targets on the destination node (in our example this would be 192.168.0.240) and click the **apply** to confirm.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Setup > iSCSI initiator

Portals

Add new portal server

Portal IP: 192.168.0.240

Portal port: 3260

CHAP enable

apply

Please apply changes or press "reload" button to discard

iSCSI Initiator name

Name: iqn.com.example:01.50efc45a77b

apply

Event Viewer

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

3. ... Continue

Select 192.168.0.240 within the "Portals" field.

In Portal manager, select the name of the iSCSI target and click the **connect** button.

The screenshot shows the open-e web interface for configuring iSCSI. The top navigation bar includes 'SETUP', 'CONFIGURATION', 'MAINTENANCE', 'STATUS', and 'HELP'. The current page is 'Setup > iSCSI initiator > 192.168.0.240'. The 'Portals' section on the left shows a list with '192.168.0.240' selected. The 'Portal manager' section on the right shows a table with the following data:

Name	Status
iqn.2016-03:dss2.target0	unconnected

Below the table are input fields for 'CHAP user:' and 'CHAP secret:', and a red 'connect' button. A note below the button says 'Please apply changes or press "reload" button to discard'. At the bottom, there is a 'Remove portal' dialog with a 'remove' button.

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

3. ... Continue

iSCSI target: `iqn.2016-03:dss2.target0` has been connected successfully.

The screenshot shows the open-e web interface for configuring iSCSI. The breadcrumb path is "Setup > iSCSI initiator > 192.168.0.240".

- Portals:** A list of portals for IP 192.168.0.240, including `iqn.2016-03:dss2.target0`.
- Portal manager:** A table showing the portal `iqn.2016-03:dss2.target0` is `connected`. Below the table are input fields for "CHAP user:" and "CHAP secret:" (masked with dots), and a "connect" button.
- Remove portal:** A message box with an info icon stating: "One or more targets are connected. Please disconnect them first."

At the bottom of the interface, there is an "Event Viewer" section and a footer that reads "Data Storage Software V7 - All rights reserved".

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

3. ... Continue

Next, click on the name iSCSI target within "Portals", in this example on the name: [iqn.2016-03:dss2.target0](#).

In Target manager you can view the connected target's name as well as its size.

The screenshot shows the open-e web interface for configuring iSCSI. The breadcrumb trail is: Setup > iSCSI initiator > iqn.2016-03:dss2.target0. The 'Portals' section shows a list of portals, with 'iqn.2016-03:dss2.target0' selected. The 'Target manager' section shows a table with one entry: 'Unit S002' with a size of '256.00 GB'. The 'Disconnect' section shows a 'Disconnect' button.

Name	Size
Unit S002	256.00 GB

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. Configure the Local Backup

Under the "CONFIGURATION" tab, select "Volume manager" and next "Volume groups"

In the Unit manager add the selected physical units (Unit S001) to create a new volume group (in this case, vg00) and click **apply** button.

The screenshot shows the open-e web interface with the following elements:

- Header: open-e ENTERPRISE CLASS STORAGE OS for EVERY BUSINESS DATA STORAGE SOFTWARE V7
- Navigation: SETUP, CONFIGURATION, MAINTENANCE, STATUS, HELP
- Breadcrumbs: You are here: Configuration > Volume manager > Volume groups
- Left Panel: Vol. groups, Vol. replication
- Right Panel: Unit rescan (rescan button), Unit manager table, Action/Name form, Drive identifier table.

Unit	Size (GB)	Serial number	Status
<input checked="" type="checkbox"/> Unit S001	1862.95	N/A	available
<input type="checkbox"/> Unit S002	250.00	14c99582	available

Action: new volume group
Name: vg00
[apply button]

Unit	Serial number	Status
<input type="checkbox"/> Unit S001	N/A	
<input type="checkbox"/> Unit S002	14c99582	

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

Next, add the selected logical unit (Unit S002 - iSCSI Target Volume from DSS2) to create a new volume group (in this case vg01) and click the **apply** button.

The screenshot shows the open-e web interface with the following components:

- Header:** open-e logo, "ENTERPRISE CLASS STORAGE OS for EVERY BUSINESS", and "DATA STORAGE SOFTWARE V7".
- Navigation:** SETUP, CONFIGURATION, MAINTENANCE, STATUS, HELP.
- Breadcrumbs:** You are here: Configuration > Volume manager > Volume groups.
- Vol. groups:** A list containing "vg00".
- Unit rescan:** A panel with a "rescan" button.
- Unit manager:** A table with columns: Unit, Size (GB), Serial number, Status.

Unit	Size (GB)	Serial number	Status
Unit S001	1862.95	N/A	in use, vg00
Unit S002	250.00	14c99582	available
- Action:** A dropdown menu set to "new volume group".
- Name:** A text input field containing "vg01".
- Buttons:** "apply" and "reload".
- Footer:** "Please apply changes or press 'reload' button to discard".
- Drive identifier:** A table with columns: Unit, Serial number, Status.

Unit	Serial number	Status
Unit S001	N/A	
Unit S002	14c99582	
- Event Viewer:** A star icon and the text "Event Viewer".
- Page-Footer:** "Data Storage Software V7 - All rights reserved".

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

Select the appropriate volume group (vg00) from the list on the left.

Create a new NAS volume of the required size. This logical volume **lv0000** will be the source of the local backup. After assigning an appropriate amount of space for the NAS volume, click **apply** button

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

To run the local backup process, you must first define a new snapshot in the Volume manager of the volume to be backed up.
After assigning an appropriate amount of space for the snapshot, click **apply** button.

The screenshot shows the open-e Volume manager interface. The top navigation bar includes 'SETUP', 'CONFIGURATION', 'MAINTENANCE', 'STATUS', and 'HELP'. The breadcrumb trail indicates the current location: 'Configuration > Volume manager > Volume groups > vg00'. The main content area is divided into two panels. The left panel, titled 'Vol. groups', shows a tree view with 'vg00' selected. The right panel, titled 'Volume manager', displays a notification: 'Logical volume lv0000 has been created successfully.' Below this is a table of logical volumes:

Logical Volume	Type	Snap.	Rep.	Init.	Blocksize (bytes)	Size (GB)
lv0000					N/A	200.00

Below the table is a section for 'System volumes' with a table:

System volumes	Size (GB)
SWAP	4.00
Reserved for snapshots	0.00
Reserved for system	4.00
Reserved for replication	0.00
Free	1654.91

The 'Action:' dropdown is set to 'new snapshot'. The 'Assign to volume:' dropdown is set to 'Just create snapshot volume'. A slider below shows the available space (0 to 1654.91 GB) with a value of 20 GB selected. The 'apply' button is highlighted in red. A blue box with arrows points from the text on the left to the 'new snapshot' dropdown, the 'Just create snapshot volume' dropdown, and the 'apply' button.

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

Assign **snap00000** to the logical volume to be backed up (in this example - **lv0000**) and click the **apply** button.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Configuration > Volume manager > Volume groups > vg00

Vol. groups	Settings
• vg00	
• vg01	

Vol. replication	Settings

Snapshot definition	LV	Status
snap00000	lv0000	unused

Reserved for snapshots: 20.00
Reserved for system: 4.00
Reserved for replication: 0.00
Free: 1634.91

Action: new NAS volume

Use volume replication

WORM

add: 0.00 GB

apply

apply

Please apply changes or press "reload" button to discard

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

Select the appropriate volume group, **vg01** from the list on the left and create a new NAS volume of the required size. This logical volume **lv0100** will be the destination of the local backup (**lv0100** is on the iSCSI Target Volume from DSS2).

After assigning an appropriate amount of space for the NAS volume, click **apply** button.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Configuration > Volume manager > Volume groups > vg01

Vol. groups		
●	vg00	
●	vg01	

Units assigned		
Unit	Serial number	Size (GB)
Unit S002	14c99582	250.00

Volume manager	
System volumes	Size (GB)
Reserved Pool	4.00
Reserved for snapshots	0.00
Reserved for system	4.00
Reserved for replication	0.00
Free	241.94

Action: new NAS volume

Use volume replication

WORM

0 | 241.94

< > add: 220 GB

apply

Please apply changes or press "reload" button to discard

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

Logical volume lv0100 has been created.

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SETUP CONFIGURATION MAINTENANCE STATUS HELP

You are here: Configuration > Volume manager > Volume groups > vg01

Vol. groups

- vg00
- vg01

Vol. replication

Volume manager

Info

Logical volume lv0100 has been created successfully.

Logical Volume	Type	Snap.	Rep.	Init.	Blocksize (bytes)	Size (GB)
lv0100	NAS				N/A	220.00

System volumes	Size (GB)
Reserved Pool	4.00
Reserved for snapshots	0.00
Reserved for system	4.00
Reserved for replication	0.00
Free	21.94

Action: new NAS volume

Use volume replication

WORM

0 21.94

add: 0.00 GB

apply

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

Under the "CONFIGURATION" tab, select the "NAS settings" menu.

Check the Use local backup box. Also select, Default share on LV as lv0100, and click **apply** button.

The screenshot shows the open-e web interface. At the top, there's a navigation bar with tabs: SETUP, CONFIGURATION, MAINTENANCE, STATUS, and HELP. Below the navigation bar, the current page is identified as 'Configuration > NAS settings'. The main content area is divided into two sections: 'Antivirus setup' and 'Local backup settings'. The 'Local backup settings' section is expanded, showing several options: 'Use local backup' (checked), 'Select backup database location:' (with a dropdown menu), 'Default share on LV:' (set to 'lv0100'), 'Other share:' (set to '<choose share>'), 'Create database' (checked), and 'Move database' (unchecked). At the bottom right of this section is a red 'apply' button. Below the 'apply' button, there is a blue text prompt: 'Please apply changes or press "reload" button to discard'. At the bottom of the interface, there is an 'Event Viewer' section and a footer with the text 'Data Storage Software V7 - All rights reserved'.

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

Under the "CONFIGURATION" tab, select the "NAS resources" and "Shares".

A tree listing of NAS shared volumes in "Shares" will appear on the left side of the DSS V7 web GUI. In the example, a shared volume named Data is to be created on lv0000.

The screenshot displays the open-e web interface for configuring shares. The top navigation bar includes 'SETUP', 'CONFIGURATION', 'MAINTENANCE', 'STATUS', and 'HELP'. The current page is 'Configuration > NAS resources > Shares'. On the left, a tree view shows a single share named '1. backup_db_lv0100'. The main area is titled 'Create new share' and contains the following fields:

- Name: Data
- Comment: (empty)
- Default path: /lv0000/Data (selected)
- Specified path: /

An 'apply' button is located at the bottom right of the form. Below the form is the 'ACL (Access control list)' section, which includes a 'Browser' tab and a tree view showing a hierarchy of volumes: 'lv0000' and 'lv0100'.

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

After creation of **Data** share, you must create a share for the local backup. In the example, a shared volume named **Backup of Data**, is to be created on **lv0100** physically residing on **DSS2** and connected via iSCSI initiator.

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SETUP CONFIGURATION MAINTENANCE STATUS HELP

You are here: Configuration > NAS resources > Shares

Shares

- 1. backup_db_lv0100
- 2. Data

Users

Groups

1. users

Event Viewer

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

Under the "MAINTENANCE" tab, select "Backup" and "Backup pools"

In the Create new pool, enter a name for the pool and select Tape retention after. In this example, enter 2 months (60 days) and click on the **create** button.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Maintenance > Backup > Backup pools

Backup pools

Backup devices

Backup tasks

Data (file) rep.

Event Viewer

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Create new pool

Name: Pool60days

Tape retention after: 2 months (60 days)

Use each tape only once

create

Please apply changes or press "reload" button to discard

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

Next, choose "Backup devices".

In Create new virtual backup device function, enter a name for the virtual backup device, and select Share. In this example choose Backup of Data and click **create** button.

The screenshot shows the open-e web interface. The top navigation bar includes 'open-e', 'ENTERPRISE CLASS STORAGE OS for EVERY BUSINESS', and 'DATA STORAGE SOFTWARE V7'. Below this are tabs for 'SETUP', 'CONFIGURATION', 'MAINTENANCE', 'STATUS', and 'HELP'. The breadcrumb trail reads 'You are here: Maintenance > Backup > Backup devices'. The main content area is divided into several sections: 'Backup pools' (containing 'Pool60days'), 'Backup devices' (highlighted with a blue arrow), 'Backup tasks', and 'Data (file) rep.'. A modal dialog box titled 'Create new virtual backup device' is open, showing fields for 'Name:' (containing 'VirtualTape'), 'Use as device:' (a dropdown menu with 'Backup of Data' selected), and 'Share:' (a radio button that is selected). A red 'create' button is at the bottom right of the dialog. A blue arrow points from the 'Backup devices' section to the dialog, and another blue arrow points from the 'Share:' radio button to the 'Share:' label. At the bottom of the page, there is an 'Event Viewer' icon and the text 'Data Storage Software V7 - All rights reserved'.

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

After the DSS V7 WEB page has been reloaded, the new Backup device should appear. Next, click VirtualTape, in the "Backup devices" tree.

In Label new tape function enter a name for the new tape (Tape001) and select the Pool name. In this example, choose Pool60days. Next, check the box, Limit tape size and choose the appropriate capacity for the new tape. Click **apply** button. In this example, 4 tapes will be created.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Maintenance > Backup > Backup devices > VirtualTape

Backup pools

- Pool60days

Backup devices

- VirtualTape

Backup tasks

Data (file) rep.

Label new tape

Name: Tape001

Pool name: Pool60days

Limit tape size

50 GB

apply

Please apply changes or press "reload" button to discard

Backup device tapes

Info

No tapes. To use this device you must label a tape first.

Remove backup device

remove

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

Now create the next 3 tapes accordingly.

The screenshot shows the open-e web interface for configuring backup tapes. The breadcrumb trail indicates the current location: Maintenance > Backup > Backup devices > VirtualTape. The 'Label new tape' form is active, showing the following fields:

- Name: Tape002
- Pool name: Pool60days
- Limit tape size: (50 GB)

The 'Backup device tapes' table shows the following data:

Name	Pool	Status	Used/size	Action
Tape001	Pool60days	Append	0.00kB/50.00GB	[Refresh] [Delete]

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

After creating tapes in Backup device tapes function, four tapes are present.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Maintenance > Backup > Backup devices > VirtualTape

Backup pools

- Pool60days

Backup devices

- VirtualTape

Backup tasks

-

Data (file) rep.

-

Label new tape

Name:

Pool name:

Limit tape size

apply

Backup device tapes

Name	Pool	Status	Used/size	Action
▼ Tape001	Pool60days	Append	0.00kB/50.00GB	
▼ Tape002	Pool60days	Append	0.00kB/50.00GB	
▼ Tape003	Pool60days	Append	0.00kB/50.00GB	
▼ Tape004	Pool60days	Append	0.00kB/50.00GB	

Remove backup device

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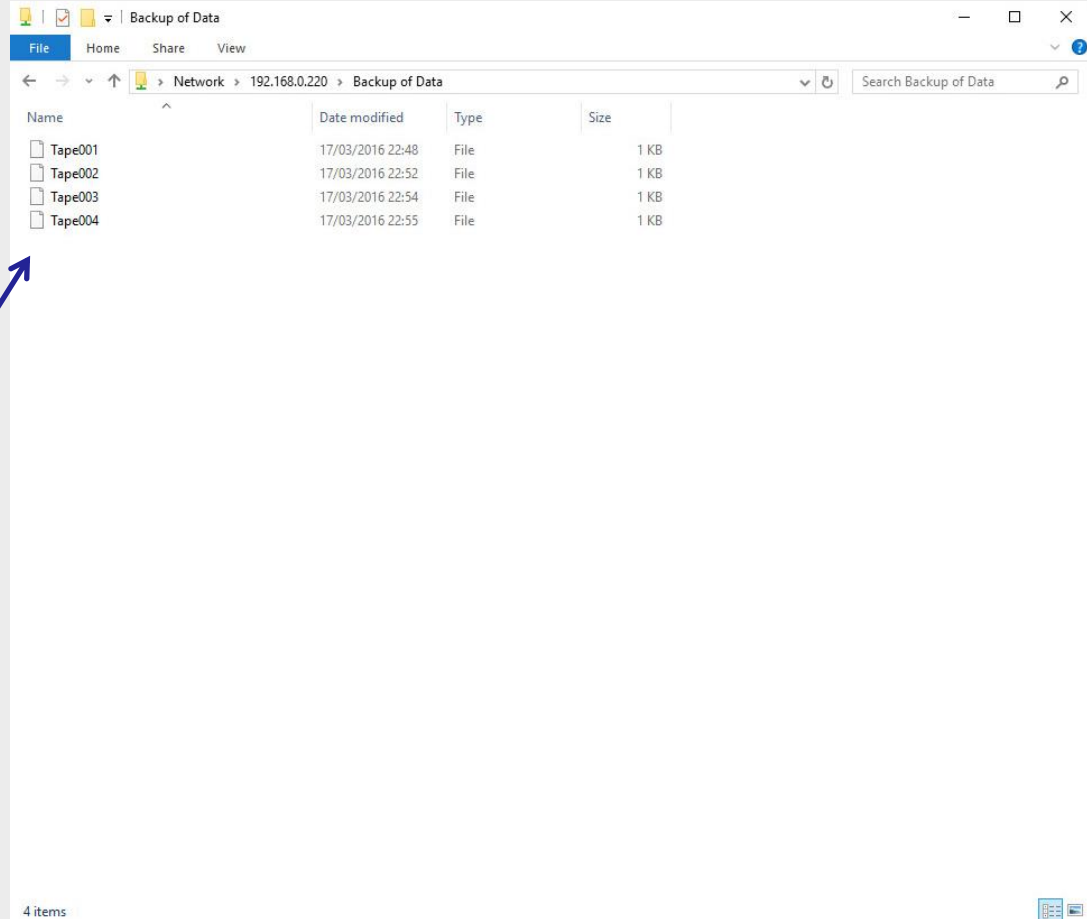
Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

In Backup of Data share, four virtual tapes are present.



Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

Next, select "Backup tasks". In the Create new backup task function enter a name for the backup tasks and select the Logical volume. In this example choose lv0000 .

Next, you must select the shares for the local backup (Data). Move the shares you want to back up from Available list to Assigned list by clicking → button.

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

In the **Create new backup task** function, choose **Snapshot** and select **Store on pool**. In this example, **snap0000** and **Pool60days**. Next, select the backup **Level** (e.g. **incremental**) check box, **Compress data** (e.g. **normal**), and click the **apply** button.

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

After the DSS V7 WEB page has been reloaded, the new Backup tasks should appear. Next, click **BackupTask001**, in the "Backup tasks" tree.

In the **Create new schedule for backup task** function, enter a **Comment** for the new schedule and **Select time**. In this example choose **Weekly** and check the box for all of days of the week. Select time for the start task (8 pm). Next, click the **apply** button.

LV:	lv0000
Snapshot:	snap00000
Level:	incremental
Compression:	normal
Full backup every:	off

Create new schedule for backup task

Comment:

Select time:

Monday Saturday
 Tuesday Sunday
 Wednesday
 Thursday
 Friday

Start :

Every week
 Every even week
 Every odd week

apply

Please apply changes or press "reload" button to discard

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

In Backup tasks function you can see status of the backup tasks.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Maintenance > Backup > Backup tasks

Backup pools

- Pool60days

Backup devices

- VirtualTape

Backup tasks

- BackupTask001

Data (file) rep.

Name	Start time	Action
BackupTask001	n/a	[Play] [Stop] [Delete]

last log
No logs found.

short description

shares: Data

pool: Pool60days

level: incremental

Create new backup task

Name:

Logical volume:

Shares for backup:

Available shares: Search:

Assigned shares: Search:

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

The Backup tasks function shows the backup task running at 8 pm.

The screenshot shows the open-e web interface for 'DATA STORAGE SOFTWARE V7'. The navigation menu includes SETUP, CONFIGURATION, MAINTENANCE, STATUS, and HELP. The current page is 'Maintenance > Backup > Backup tasks'. The interface is divided into several panels:

- Backup pools:** Contains 'Pool60days'.
- Backup devices:** Contains 'VirtualTape'.
- Backup tasks:** Contains 'BackupTask001'. A blue arrow points from this task to the 'Backup tasks' table in the main content area.
- Data (file) rep.:** Empty panel.

The main content area displays the details for 'BackupTask001':

Name	Start time	Action
BackupTask001	2016-03-19 20:00:05	[Start] [Stop] [Refresh]

last log

Time	Action
2016-03-18 20:00:33	start
2016-03-18 20:08:33	stop
2016-03-19 20:00:34	start

short description

shares:	Data
pool:	Pool60days
level:	incremental

Create new backup task

Name:

Logical volume:

Shares for backup:

Backup to an iSCSI Target Volume over a LAN



open-e
Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

Under the "STATUS" tab, select "Tasks" and Backup.

Runnings tasks tab displays information for currently running tasks, in this case shows BackupTask001.

The screenshot shows the open-e web interface. At the top, there is a navigation bar with tabs: SETUP, CONFIGURATION, MAINTENANCE, STATUS, and HELP. Below this, a breadcrumb trail reads "You are here: Status > Tasks > Backup".

The main content area is divided into two sections:

- Tasks:** A sidebar menu with a gear icon and a question mark. It lists several task categories: Backup (selected with a red dot), Restore from backup, Data (File) Replication, Antivirus, Volume Replication, and Snapshots.
- Running tasks:** A table with columns for Name, Type, and Start time. It shows one entry: BackupTask001, Backup, 2016-03-19 20:00:05.

Below the Running tasks section is a **Tasks log** table with columns for Time, Name, Type, Status, and Action. It shows three entries for BackupTask001:

Time	Name	Type	Status	Action
2016-03-19 20:00:34	BackupTask001	Backup	OK	Started
2016-03-18 20:08:33	BackupTask001	Backup	OK	Finished
2016-03-18 20:00:33	BackupTask001	Backup	OK	Started

At the bottom of the interface, there is an "Event Viewer" section with a star icon and the text "Data Storage Software V7 - All rights reserved".

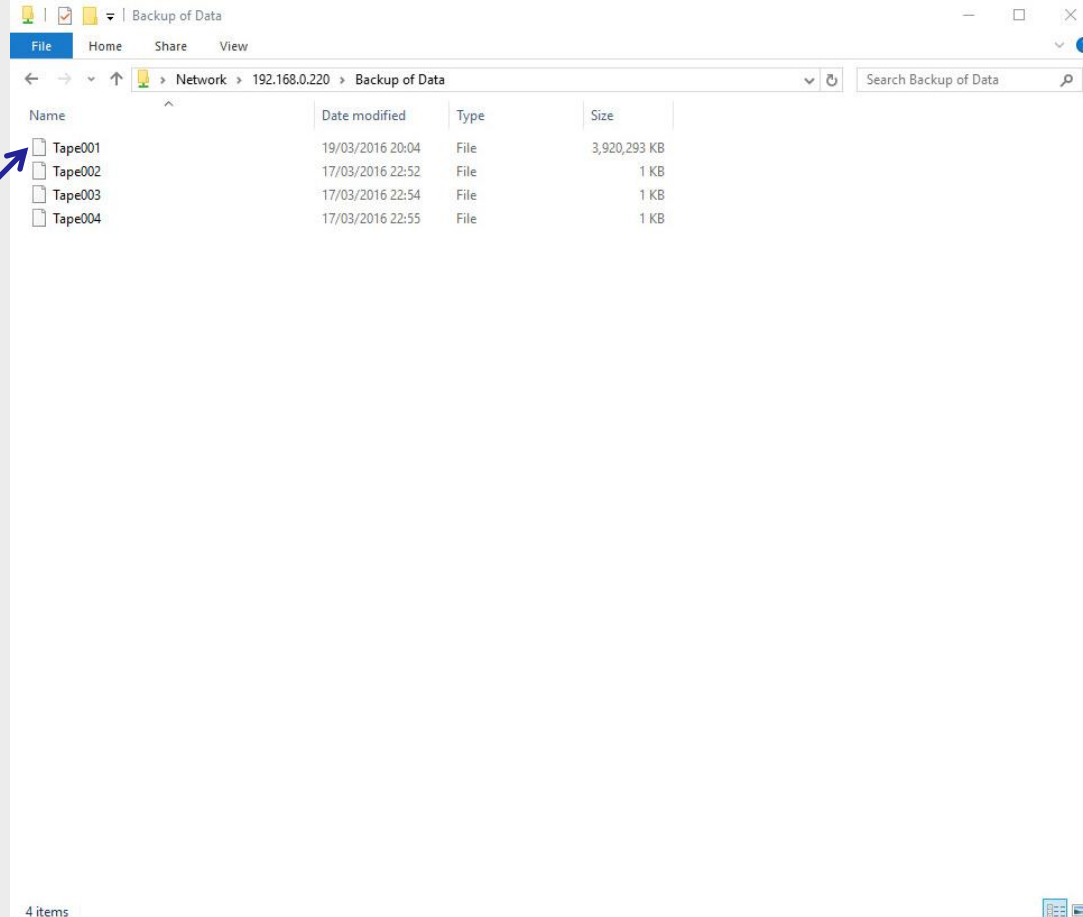
Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

4. ... Continue

After the end of the Backup all data from Data share are located in one file Tape001.



Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

5. Create the Restore from Backup

Under the "CONFIGURATION" tab, select the "NAS resources" menu and "Shares".

In order to execute the Restore, you must create new share. In the example, a shared volume named **Restore from Backup** is to be created on **lv0000**.

The screenshot displays the open-e web management interface. At the top, the navigation bar includes 'SETUP', 'CONFIGURATION', 'MAINTENANCE', 'STATUS', and 'HELP'. The 'CONFIGURATION' tab is active, and the breadcrumb trail shows 'You are here: Configuration > NAS resources > Shares'. The left sidebar contains three sections: 'Shares' (with a list of '1. Backup of Data', '2. backup_db_lv0100', and '3. Data'), 'Users' (with '1. john'), and 'Groups' (with '1. users'). The main content area is titled 'Create new share' and contains the following fields:

- Name:** Restore from Backup
- Comment:** (empty text area)
- Default path:** /lv0000/Restore from Backup (selected with a radio button)
- Specified path:** / (selected with a radio button)

A red 'apply' button is located at the bottom right of the form. Below the form, there is an 'ACL (Access control list)' section with a 'Browser' tab and a tree view showing a hierarchy of volumes: 'lv0000' and 'lv0100'. The footer of the interface includes 'Event Viewer' and 'Data Storage Software V7 - All rights reserved'.

Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

5. ... Continue

Under the "MAINTENANCE" tab, select the "Restore" menu.

In the Restore backup task function, check the box BackupTask001. Enter a name for the Restore tasks name (e.g. RestoreTask001), and select the destination share in the Restore to field. In this example, choose Restore from Backup share. Next, click on the **apply** button, and confirm this action by clicking the **yes** button again.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Maintenance > Restore

Restore backup task

Backup tasks search

Task:

Device:

File name contain:

From date: Day Month Year

To date: Day Month Year

Name	Date	Device
<input type="checkbox"/> BackupTask001	2016-03-19 20:00:37	VirtualTape
<input checked="" type="checkbox"/> BackupTask001	2016-03-18 20:00:36	VirtualTape

Restore task name:

Restore to:

Overwrite files

always
 if newer
 if older
 never

run immediately after creation

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Backup to an iSCSI Target Volume over a LAN



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Data Server (DSS1)
Source node
IP Address:192.168.0.220

5. ... Continue

After the end of the Restore Backup in **Backup Restore tasks**, you will start the task again.

After clicking button on the **Backup Restore task**, detailed information regarding current restore task will be presented.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Maintenance > Restore

Restore tasks

- RestoreTask001

Backup Restore tasks

Name	Start time	Action
RestoreTask001	2016-03-19 21:04:51	<input type="checkbox"/> <input type="checkbox"/> <input type="checkbox"/>

Restore backup task

Info

Backup restore in progress. Please wait for backup restore process to finish.

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

5. ... Continue

Next, click on the RestoreTask001 name.

In the Restore task, to display detailed information on the current restore task.

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SETUP | CONFIGURATION | MAINTENANCE | STATUS | HELP

You are here: Maintenance > Restore > RestoreTask001

Restore tasks

- RestoreTask001

Restore task

Attribute	Value
Backups:	RestoreTask001
Destination shares:	Restore from Backup
Device:	VirtualTape
Overwrite files:	always

Remove restore task

remove

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Backup to an iSCSI Target Volume over a LAN



Data Server (DSS1)
Source node
IP Address:192.168.0.220

5. ... Continue

Under the "STATUS" tab, select the "Tasks" menu. Next, in the "Tasks" tree on the left select Restore from backup.

Running tasks tab displays information for currently running tasks, in this case about RestoreTask001.

The screenshot shows the open-e web interface. At the top, there's a navigation bar with 'open-e' logo, 'ENTERPRISE CLASS STORAGE OS for EVERY BUSINESS', and 'DATA STORAGE SOFTWARE V7'. Below this is a menu with 'SETUP', 'CONFIGURATION', 'MAINTENANCE', 'STATUS', and 'HELP'. The 'STATUS' tab is active, and the breadcrumb trail is 'You are here: Status > Tasks > Restore from backup'. On the left, a 'Tasks' tree is visible with 'Restore from backup' selected. On the right, the 'Running tasks' table shows one task: 'RestoreTask001' of type 'Restore from backup' starting at '2016-03-19 21:04:51'. Below this is the 'Tasks log' table, which shows a log entry for 'RestoreTask001' at '2016-03-19 21:04:52' with a status of 'OK' and action 'Started'. At the bottom left, there's an 'Event Viewer' icon. At the bottom right, it says 'Data Storage Software V7 - All rights reserved'.

Name	Type	Start time
RestoreTask001	Restore from backup	2016-03-19 21:04:51

Time	Name	Type	Status	Action
2016-03-19 21:04:52	RestoreTask001	Restore from backup	OK	Started

Backup to an iSCSI Target Volume over a LAN

open-e



Data Server (DSS1)
Source node
IP Address:192.168.0.220

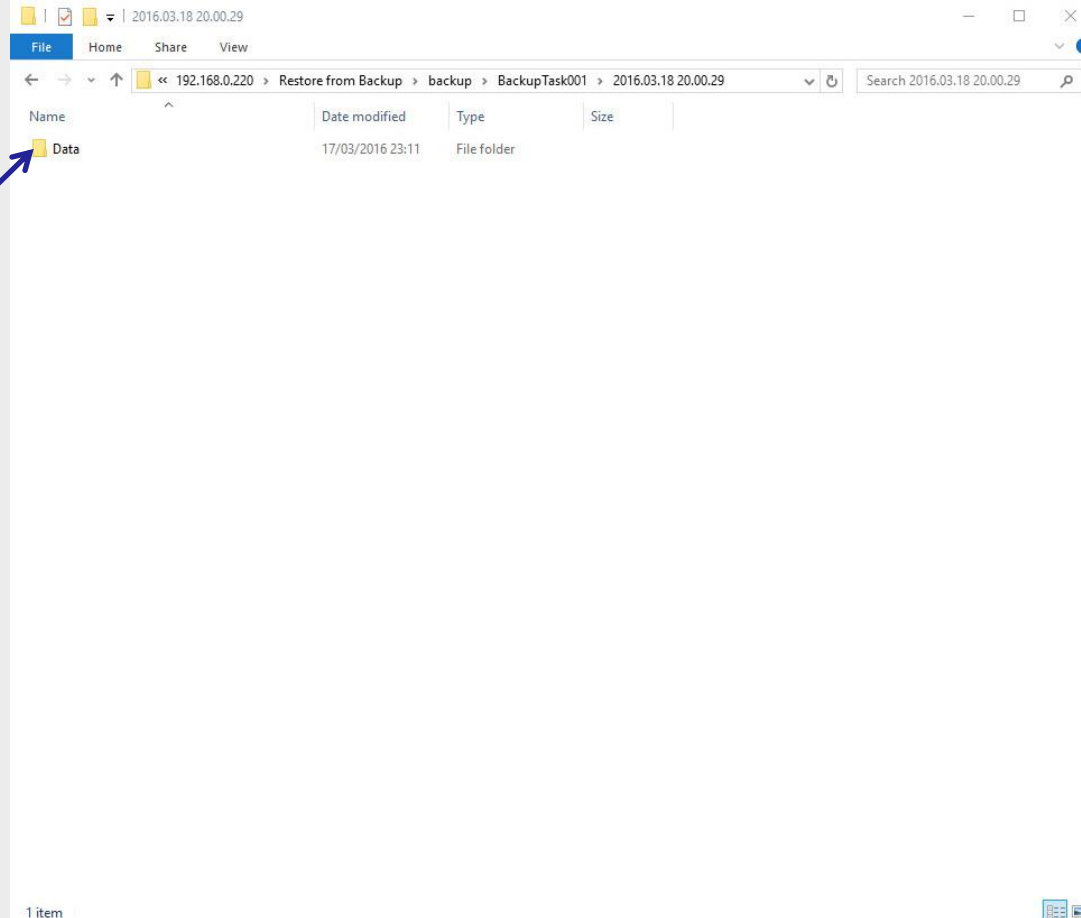
5. ... Continue

After the end of the Restore from Backup all data from the **Data** share are available on the **Restore from Backup** share.

NOTE:

In case you restore data from more than one backup you need to merge data from all backup folders (starting from the oldest one) to a single data set.

The configuration of the Restore from Backup is now complete.



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