



# **Shut down the impaired controller - AFF A700 and FAS9000**

ONTAP Systems

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# Table of Contents

- Shut down the impaired controller - AFF A700 and FAS9000 ..... 1
  - Option 1: Most configurations ..... 1
  - Option 2: Controller is in a two-node MetroCluster ..... 1

# Shut down the impaired controller - AFF A700 and FAS9000

You can shut down or take over the impaired controller using different procedures, depending on the storage system hardware configuration.

## Option 1: Most configurations

After completing the NVE or NSE tasks, you need to complete the shutdown of the impaired node.

### Steps

1. If the impaired node isn't at the LOADER prompt:

*If the impaired node displays...	Then...*
Waiting for giveback...	Press Ctrl-C, and then respond <code>y</code> when prompted.
System prompt or password prompt (enter system password)	<div>Take over or halt the impaired node:</div> <ul style="list-style-type: none"><li>• For an HA pair, take over the impaired node from the healthy node: <code>storage failover takeover -ofnode `impaired_node_name`</code></li></ul> <div>When the impaired node shows Waiting for giveback..., press Ctrl-C, and then respond <code>y</code>.</div>

2. From the LOADER prompt, enter: `printenv` to capture all boot environmental variables. Save the output to your log file.



This command may not work if the boot device is corrupted or non-functional.

## Option 2: Controller is in a two-node MetroCluster

To shut down the impaired node, you must determine the status of the node and, if necessary, switch over the node so that the healthy node continues to serve data from the impaired node storage.

### About this task

- If you are using NetApp Storage Encryption, you must have reset the MSID using the instructions in the "Returning SEDs to unprotected mode" section of the *ONTAP 9 NetApp Encryption Power Guide*.

[ONTAP 9 NetApp Encryption Power Guide](#)

- You must leave the power supplies turned on at the end of this procedure to provide power to the healthy node.

### Steps

1. Check the MetroCluster status to determine whether the impaired node has automatically switched over to

the healthy node: `metrocluster show`

- Depending on whether an automatic switchover has occurred, proceed according to the following table:

<b>*If the impaired node...</b>	<b>Then...*</b>
Has automatically switched over	Proceed to the next step.
Has not automatically switched over	Perform a planned switchover operation from the healthy node: <code>metrocluster switchover</code>
Has not automatically switched over, you attempted switchover with the <code>metrocluster switchover</code> command, and the switchover was vetoed	Review the veto messages and, if possible, resolve the issue and try again. If you are unable to resolve the issue, contact technical support.

- Resynchronize the data aggregates by running the `metrocluster heal -phase aggregates` command from the surviving cluster.

```
controller_A_1:> metrocluster heal -phase aggregates
[Job 130] Job succeeded: Heal Aggregates is successful.
```

If the healing is vetoed, you have the option of reissuing the `metrocluster heal` command with the `-override-vetoes` parameter. If you use this optional parameter, the system overrides any soft vetoes that prevent the healing operation.

- Verify that the operation has been completed by using the `metrocluster operation show` command.

```
controller_A_1:> metrocluster operation show
Operation: heal-aggregates
State: successful
Start Time: 7/25/2016 18:45:55
End Time: 7/25/2016 18:45:56
Errors: -
```

- Check the state of the aggregates by using the `storage aggregate show` command.

```

controller_A_1::> storage aggregate show
Aggregate      Size Available Used% State   #Vols  Nodes           RAID
Status
-----
...
aggr_b2      227.1GB   227.1GB    0% online      0 mcc1-a2
raid_dp, mirrored, normal...

```

6. Heal the root aggregates by using the `metrocluster heal -phase root-aggregates` command.

```

mcc1A::> metrocluster heal -phase root-aggregates
[Job 137] Job succeeded: Heal Root Aggregates is successful

```

If the healing is vetoed, you have the option of reissuing the `metrocluster heal` command with the `-override-vetoes` parameter. If you use this optional parameter, the system overrides any soft vetoes that prevent the healing operation.

7. Verify that the heal operation is complete by using the `metrocluster operation show` command on the destination cluster:

```

mcc1A::> metrocluster operation show
Operation: heal-root-aggregates
State: successful
Start Time: 7/29/2016 20:54:41
End Time: 7/29/2016 20:54:42
Errors: -

```

8. On the impaired controller module, disconnect the power supplies.

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