

Shut down the impaired controller - AFF A220 and FAS2700

ONTAP Systems

Martin Houser September 28, 2021

This PDF was generated from https://docs.netapp.com/us-en/ontap-systems/fas2700/controller-replace-shutdown.html on October 26, 2021. Always check docs.netapp.com for the latest.

Table of Contents

Shut down the impaired controller - AFF A220 and FAS2700	 1
Option 1: Shut down the node	 1
Option 2: Shut down a node in a two-node MetroCluster configuration	 1

Shut down the impaired controller - AFF A220 and FAS2700

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

Option 1: Shut down the node

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

If you have a cluster with more than two nodes, it must be in quorum. If the cluster is not in quorum or a healthy node shows false for eligibility and health, you must correct the issue before shutting down the impaired node.

ONTAP 9 System Administration Reference

Steps

1. If AutoSupport is enabled, suppress automatic case creation by invoking an AutoSupport message: system node autosupport invoke -node * -type all -message MAINT= number of hours down h

The following AutoSupport message suppresses automatic case creation for two hours: cluster1:*> system node autosupport invoke -node * -type all -message MAINT=2h

- 2. If the impaired node is part of an HA pair, disable automatic giveback from the console of the healthy node: storage failover modify -node local -auto-giveback false
- 3. Take the impaired node to the LOADER prompt:

If the impaired node is displaying	Then
The LOADER prompt	Go to the next step.
Waiting for giveback	Press Ctrl-C, and then respond y.
System prompt or password prompt (enter system password)	Take over or halt the impaired node: storage failover takeover -ofnode <code>impaired_node_name</code> When the impaired node shows Waiting for giveback, press Ctrl-C, and then respond y.

Option 2: Shut down a node in a two-node MetroCluster configuration

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

If the impaired node	Then
Has automatically switched over	Proceed to the next step.
Has not automatically switched over	Perform a planned switchover operation from the healthy node: metrocluster switchover
Has not automatically switched over, you attempted switchover with the metrocluster switchover 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.

3. 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.

4. 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: -
```

5. 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:

```
mcclA::> 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.

Copyright Information

Copyright © 2021 NetApp, Inc. All rights reserved. Printed in the U.S. No part of this document covered by copyright may be reproduced in any form or by any means-graphic, electronic, or mechanical, including photocopying, recording, taping, or storage in an electronic retrieval system- without prior written permission of the copyright owner.

Software derived from copyrighted NetApp material is subject to the following license and disclaimer:

THIS SOFTWARE IS PROVIDED BY NETAPP "AS IS" AND WITHOUT ANY EXPRESS OR IMPLIED WARRANTIES, INCLUDING, BUT NOT LIMITED TO, THE IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE, WHICH ARE HEREBY DISCLAIMED. IN NO EVENT SHALL NETAPP BE LIABLE FOR ANY DIRECT, INDIRECT, INCIDENTAL, SPECIAL, EXEMPLARY, OR CONSEQUENTIAL DAMAGES (INCLUDING, BUT NOT LIMITED TO, PROCUREMENT OF SUBSTITUTE GOODS OR SERVICES; LOSS OF USE, DATA, OR PROFITS; OR BUSINESS INTERRUPTION) HOWEVER CAUSED AND ON ANY THEORY OF LIABILITY, WHETHER IN CONTRACT, STRICT LIABILITY, OR TORT (INCLUDING NEGLIGENCE OR OTHERWISE) ARISING IN ANY WAY OUT OF THE USE OF THIS SOFTWARE, EVEN IF ADVISED OF THE POSSIBILITY OF SUCH DAMAGE.

NetApp reserves the right to change any products described herein at any time, and without notice. NetApp assumes no responsibility or liability arising from the use of products described herein, except as expressly agreed to in writing by NetApp. The use or purchase of this product does not convey a license under any patent rights, trademark rights, or any other intellectual property rights of NetApp.

The product described in this manual may be protected by one or more U.S. patents, foreign patents, or pending applications.

RESTRICTED RIGHTS LEGEND: Use, duplication, or disclosure by the government is subject to restrictions as set forth in subparagraph (c)(1)(ii) of the Rights in Technical Data and Computer Software clause at DFARS 252.277-7103 (October 1988) and FAR 52-227-19 (June 1987).

Trademark Information

NETAPP, the NETAPP logo, and the marks listed at http://www.netapp.com/TM are trademarks of NetApp, Inc. Other company and product names may be trademarks of their respective owners.