



sis events

ONTAP 9.15.1 EMS reference

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sis events

sis.aggr events

sis.aggr.cvs.undo.abort

Severity

NOTICE

Description

This message occurs when undo of cross volume savings on aggregate has to abort due to some error conditions.

Corrective Action

(None).

Syslog Message

Undo of cross volume savings on aggregate %s aborted. Volume %s encountered error: %s

Parameters

aggr_name (STRING): Aggregate name.
vvol_name (STRING): Flex volume name.
error (STRING): Error code for the abort.

sis.aggr.metadir.create.failed

Severity

ERROR

Description

This message occurs when the creation of SIS metafiles in the aggregate containing the SIS volume fails. Change logging will be turned off on the volume.

Corrective Action

Ensure that space is available in the aggregate containing the volume. Use the 'sis on' command to turn on change logging on the volume, which attempts to re-create SIS metafiles in the aggregate. If enough space is available, start wafliion on the aggregate containing the indicated flexible volume.

Syslog Message

Creation of aggregate metadir failed for SIS volume %s%s. Change logging will be turned off on the volume: %s.

Parameters

volname (STRING): SIS volume name.
volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.
reason (STRING): Reason for the failure.

sis.auto events

sis.auto.session.change

Severity

NOTICE

Description

This message occurs whenever the number of background deduplication sessions change on a node because of throttling based on system load for the volumes with efficiency policy type as auto.

Corrective Action

(None).

Syslog Message

ADS: Number of auto sessions changed from %d to %d

Parameters

old_sessions (INT): prev sessions count.

new_sessions (INT): new sessions count.

sis.autosched events

sis.autoSched.failed

Severity

ERROR

Description

This event is issued when a SIS volume operation could not be auto scheduled due to unexpected conditions.

Corrective Action

(None).

Syslog Message

SIS operation for %s%s could not be auto scheduled: %s

Parameters

vol (STRING): Path to a SIS volume

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

err (STRING): Error message

sis.c2c events

sis.c2c.start.fail

Severity

ERROR

Description

This event is issued when dense scanner could not start on c2c restore volume during restore operation.

Corrective Action

Run "sis start" command to manually start the SIS scanner.

Syslog Message

SIS scanner on C2C restore volume %s%s could not be started: %s.

Parameters

vol (STRING): The name of the volume

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

err (STRING): Error message

sis.cfg events

sis.cfg.deleted

Severity

ERROR

Description

This message occurs when the configuration file for a Single Instance Storage (SIS) volume is deleted. This leads to the loss of deduplication configuration for the volume and statistics of deduplication operations.

Corrective Action

Remount the volume, enable deduplication using the "sis on" command, configure the volume using the "sis config" command, and then run the "sis start -s -m" command to start building deduplication metadata.

Syslog Message

SIS configuration for volume %s%s was deleted: %s. Remount the volume, then enable SIS and reconfigure the volume to resume deduplication.

Parameters

path (STRING): Path to a SIS volume.

volident (STRING): To uniquely identify the volume in cases where the volume name itself is insufficient.

reason (STRING): Reason for deletion.

sis.cfg.invalidEntry

Severity

ERROR

Description

This event is issued when a SIS volume operation found an invalid configuration for the volume.

Corrective Action

Automatically checks and creates default configuration after detection. Please use 'sis' command to change default settings.

Syslog Message

SIS volume configuration: found invalid SIS configuration file %s%s: %s

Parameters

path (STRING): Path to a SIS volume

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

reason (STRING): Reason why SIS operation considered it as wrong.

sis.cfg.setFailed

Severity

ERROR

Description

This message occurs when a Single Instance Storage (SIS) volume operation fails to write in the configuration file. This might lead to incorrect reporting of statistics. If the error occurred during a Data ONTAP® version upgrade, it might also lead to the upgraded configuration not being loaded. The volume might not appear in the 'sis status' command output as a result. Also, the system might not allow changing the configuration for that volume.

Corrective Action

Ensure that space is available in the indicated volume. If this error occurred during a Data ONTAP version upgrade and the volume does not appear in the 'sis status' command output, remount the volume after correcting the underlying condition. If enough space is available, start wafiron on the aggregate containing the indicated flexible volume.

Syslog Message

Saving SIS volume configuration for volume %s%s : %s

Parameters

path (STRING): Path to the SIS volume.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

reason (STRING): Reason for the failure.

sis.changelog events

sis.changelog.full

Severity

ERROR

Description

This message occurs when the Single Instance Storage (SIS) change logging metafile is full. Change logging is stopped. New writes to the volume will not be change logged until the next SIS operation.

Corrective Action

Issue the 'sis start' command on the volume to process existing changelogs. To process changelog files more frequently before they reach full, adjust the SIS operation schedule with the 'sis config -s' command. If there is significant loss of savings, then run the 'sis start -s' command, allowing it to run to completion.

Syslog Message

SIS change logging metafile for volume %s%s%s is full.

Parameters

host (STRING): Owing host of the volume.

vol (STRING): Name of the volume.

volident (STRING): Uniquely identifies the volume when the volume name itself is insufficient.

sis.changelog.noinit

Severity

ERROR

Description

This event is issued when the change logging operation could not be initialized on a SIS volume.

Corrective Action

Run "sis on" command to reinitialzie the change logging operation.

Syslog Message

Change logging operation on volume %s%s could not be initialized: %s.

Parameters

vol (STRING): The name of the volume

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

err (STRING): Error message

sis.changelog.noload

Severity

NOTICE

Description

This event is issued when prior change logging metafiles could not be reused during the initialization. New metafiles will be created for the operation.

Corrective Action

(None).

Syslog Message

Prior Change logging metafiles on volume %s%s could not be reused.

Parameters

vol (STRING): The name of the volume

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.changelog.truncate

Severity

NOTICE

Description

This message occurs when the Single Instance Storage (SIS) change logging metafile is truncated as part of ADS session.

Corrective Action

(None).

Syslog Message

Prior Change logging metafiles on volume %s%s are truncated.

Parameters

host (STRING): Owing host of the volume.

vol (STRING): Name of the volume.

volident (STRING): Uniquely identifies the volume when the volume name itself is insufficient.

sis.chkpoint events

sis.chkpoint.delete

Severity

INFORMATIONAL

Description

This message occurs when a Single Instance Storage (SIS) checkpoint is deleted. The current SIS operation is restarted from the beginning.

Corrective Action

(None).

Syslog Message

SIS checkpoint on the volume '%s%s' is deleted. Starting current SIS operation from the beginning.

Parameters

volume (STRING): Volume path.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.chkpoint.restore.failed

Severity

ERROR

Description

This message occurs when a Single Instance Storage (SIS) operation fails to restore from a previous checkpoint. The SIS operation is restarted from the beginning.

Corrective Action

(None).

Syslog Message

SIS operation on the volume '%s%s' failed to restore from a previous checkpoint. Starting SIS operation from the beginning.

Parameters

volume (STRING): Volume name.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.clog events

sis.clog.disabled

Severity

ERROR

Description

This message occurs while mounting a volume, when an error with the SIS metafile operation results in the change logging function being disabled to avoid inconsistencies.

Corrective Action

Reinitialize the change logging operation by using the 'sis on' command.

Syslog Message

Change logging has been disabled for %s%s due to an error that occurred while mounting the volume during the SIS metafile operation: %s.

Parameters

path (STRING): Path to the SIS volume.

volident (STRING): To uniquely identify the volume in cases where the volume name itself is insufficient.

reason (STRING): Reason for the failure.

sis.compress events

sis.compress.skip

Severity

INFORMATIONAL

Description

This message occurs when postprocess compression is skipped during a deduplication operation, even though postprocess compression is enabled on the volume. Post process compression is not supported on a node configured with the All-Flash Optimized personality.

Corrective Action

(None).

Syslog Message

Skipped postprocess compression on volume %s%s because the node is All-Flash Optimized.

Parameters

path (STRING): Path to the deduplicated volume.

volident (STRING): Unique volume identifier.

sis.corrupt events

sis.corrupt.metafile.deleted

Severity

NOTICE

Description

This message occurs when a Single Instance Storage (SIS) metafile is deleted because there are Disk/Media errors affecting the file.

Corrective Action

The deleted metafile might be recovered automatically the next time you run the 'sis start' command. If you have not previously run the 'sis start' command on this volume, run the 'sis start -s' command to generate metafiles and obtain efficient deduplication. Contact NetApp technical support for guidance.

Syslog Message

SIS metafile on volume '%s%s' is deleted.

Parameters

volume (STRING): Volume path.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.default events

sis.default.auto.se.enable

Severity

NOTICE

Description

This message occurs whenever volume move is done from a non All Flash Optimized node to an All Flash Optimized node and we attempt to enable storage efficiency features and automatic offline volume efficiency.

Corrective Action

(None).

Syslog Message

Volume efficiency features will be enabled for volume %s on aggregate %s.

Parameters

vvol_name (STRING): Flex volume name.

aggr_name (STRING): Aggregate name.

sis.default.auto.se.enable.fail

Severity

NOTICE

Description

This message occurs whenever volume move is done from a non All Flash Optimized node to an All Flash Optimized node and the attempt to enable automatic offline volume efficiency failed.

Corrective Action

(None).

Syslog Message

Failed to enable automatic offline volume efficiency features for volume %s on aggregate %s.

Parameters

vvol_name (STRING): Flex volume name.

aggr_name (STRING): Aggregate name.

reason (STRING): Reason for the failure.

sis.enable events

sis.enable.post.sm.break

Severity

NOTICE

Description

This message occurs when the "storage efficiency" feature is enabled on a destination volume due to a broken SnapMirror® relationship on an All Flash Optimized system. When the relationship breaks, the DP volume is converted to RW, and all RW volumes have the "storage efficiency" feature enabled.

Corrective Action

(None).

Syslog Message

"Storage efficiency" feature has been enabled on the destination volume %s due to a SnapMirror break operation.

Parameters

volume (STRING): Destination FlexVol® volume name on which the "storage efficiency" feature is enabled.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.enable.post.ssm.init

Severity

NOTICE

Description

This message occurs when the "storage efficiency" feature is enabled on a destination volume with Synchronous SnapMirror® on an All Flash Optimized system.

Corrective Action

(None).

Syslog Message

"Storage efficiency" feature has been enabled on the destination volume %s after Asynchronous Snapmirror converted to Synchronous Snapmirror.

Parameters

volume (STRING): Destination FlexVol® volume name on which the "storage efficiency" feature is enabled.
volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.fingerprint events

sis.fingerprint.notify.lost

Severity

NOTICE

Description

This message occurs when a bad block is encountered while reading SIS metafiles. As a result, some of the fingerprint records used to identify blocks for use in deduplication might have been lost. The only impact from this is lower efficiency in deduplication.

Corrective Action

(None).

Syslog Message

Bad block found while reading SIS metafiles for volume %s%. As a result some fingerprint data might have been lost and could result in lower space savings.

Parameters

volume (STRING): Volume name.
volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.idedup events

sis.idedup.disable

Severity

NOTICE

Description

This message occurs when inline deduplication is disabled if aggregate is not hybrid or not part of All-Flash Optimized node since inline deduplication is not supported on them.

Corrective Action

(None).

Syslog Message

Disabled inline deduplication on volume %s% because the aggregate is not hybrid or not part of All-Flash Optimized node.

Parameters

path (STRING): Path to the deduplicated volume.

volident (STRING): Unique volume identifier.

sis.incorrect events

sis.incorrect.duration.notify

Severity

ERROR

Description

This message occurs when a Single Instance Storage (SIS) volume repeatedly can not finish SIS operation within user-given 'duration' settings.

Corrective Action

Change duration settings appropriately, based on SIS completion time history and total amount data that needs to be processed.

Syslog Message

SIS operation repeatedly can not finish within duration limits specified by user.

Parameters

volname (STRING): Path to the SIS volume.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.logical events

sis.logical.limit.near

Severity

NOTICE

Description

This message occurs when the deduplication engine's logical data limit is nearly reached on a volume. Logical data is the summation of used blocks, saved blocks, and compressed blocks in the volume.

Corrective Action

Move data to another volume or delete unwanted data from the volume.

Syslog Message

Deduplication engine's logical data limit is nearly reached on volume %s%s.

Parameters

volume (STRING): Volume name.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.logical.limit.reached

Severity

NOTICE

Description

This message occurs when the deduplication engine's logical data limit is reached on the volume. Deduplication operations might not run on the volume. Logical data is the summation of used blocks, saved blocks, and compressed blocks in the volume.

Corrective Action

Move data to another volume or delete unwanted data from the volume.

Syslog Message

Deduplication engine's logical data limit was reached on volume %s%s.

Parameters

volume (STRING): Volume name.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.max events

sis.max.saving.near

Severity

NOTICE

Description

This message occurs when Single Instance Storage (SIS) savings on the volume is nearing its maximum limit. No further savings can be realized on the volume after the limit is reached.

Corrective Action

(None).

Syslog Message

Maximum savings limit nearly reached on volume %s%s.

Parameters

volume (STRING): Volume name.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.max.saving.reached

Severity

NOTICE

Description

This message occurs when Single Instance Storage (SIS) savings on the volume reaches its maximum limit. No further savings can be realized on the volume.

Corrective Action

(None).

Syslog Message

Maximum savings limit reached on volume %s%s.

Parameters

volume (STRING): Volume name.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.metadata events

sis.metadata.inconsistent

Severity

ERROR

Description

This message occurs when inconsistencies are found in deduplication metadata. This might be due to a failed metadata upgrade. The impact will be very low deduplication savings.

Corrective Action

Run the 'sis start -s -m -vserver vserver_name -volume volume_name' command. This rebuilds the deduplication metadata. If the command fails or if subsequent deduplication runs do not provide adequate space savings, contact NetApp technical support.

Syslog Message

Deduplication metadata is inconsistent in volume: %s%s.

Parameters

volume (STRING): Volume name.

volident (STRING): Unique volume identifier for cases when the volume name alone is insufficient.

sis.op events

sis.op.aborted

Severity

ERROR

Description

This event is issued when a SIS volume operation is aborted due to unexpected conditions.

Corrective Action

(None).

Syslog Message

SIS operation for %s%s has aborted: %s

Parameters

path (STRING): Path to a SIS volume

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

err (STRING): Error message

sis.op.idle

Severity

NOTICE

Description

This message occurs when deduplication is enabled on the volume and deduplication process has not been run for more than configured idle threshold time set(default 7 days).

Corrective Action

Run the "sis start" command.

Syslog Message

SIS operation is idle on volume "%s" since %d weeks %d days.

Parameters

volpath (STRING): Volume name.

last_dedup_time (INT): Last Successful Deduplication operation on volume in weeks.

last_dedup_time_days (INT): Last Successful Deduplication operation on volume in days.

sis.op.stopped

Severity

INFORMATIONAL

Description

This event is issued when a SIS volume operation is stopped by user.

Corrective Action

(None).

Syslog Message

SIS operation for %s%s has stopped

Parameters

path (STRING): Path to a SIS volume

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.policy events

sis.policy.predef.create.upgradeError

Severity

NOTICE

Description

This message occurs during system software upgrade to Data ONTAP® 8.1 or later, while creating predefined policies. There is a user policy with the same name as a predefined policy prior to upgrade, and it cannot be renamed. Therefore, the predefined policy cannot be created.

Corrective Action

Rename pre-existing user policy and run system software upgrade again.

Syslog Message

Policy upgrade failed because the user policy %s could not be renamed to %s.

Parameters

old_user_policy (STRING): Name of the preexisting user policy.

renamed_user_policy (STRING): New name for the preexisting user policy.

sis.policy.rename.upgrade

Severity

INFORMATIONAL

Description

This message occurs during upgrade to Data ONTAP® 8.1 or later, while creating predefined efficiency policies. The user policy was renamed because of the creation of predefined policies.

Corrective Action

(None).

Syslog Message

During upgrade, user policy name %s is changed to %s.

Parameters

old_user_policy (STRING): Name of the preexisting user policy.

renamed_user_policy (STRING): New name for the preexisting user policy.

sis.reg events

sis.reg.invalidEntry

Severity

ERROR

Description

This event is issued when a SIS volume operation found an invalid registry entry.

Corrective Action

(None).

Syslog Message

SIS volume registry: found invalid SIS registry entry for %s%s: %s

Parameters

path (STRING): Path to a SIS volume

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

regval (STRING): Registry value

sis.revert events

sis.revert.to.has.Aborted

Severity

NOTICE

Description

This message occurs when the Single Instance Storage (SIS) volume command 'sis revert_to' has failed. This might prevent running generic Data ONTAP® 'revert_to' command successfully

Corrective Action

(None).

Syslog Message

sis 'revert_to' command has failed on volume %s%s :%s

Parameters

path (STRING): Path to the SIS volume

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

reason (STRING): Reason for the failure.

sis.revert.to.has.Succeeded

Severity

NOTICE

Description

This message occurs when the Single Instance Storage (SIS) volume command 'sis revert_to' has succeeded.

Corrective Action

(None).

Syslog Message

'sis revert_to' command has succeeded on volume %s%s

Parameters

path (STRING): Path to the SIS volume

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.revert.to.large.vol

Severity

ERROR

Description

This message occurs when the Single Instance Storage (SIS) volume command 'sis revert_to' fails because the logical data exceeded the maximum allowed for SIS in the target release. This is to prevent growing deduplication metadata beyond the size that is supported in the target release. Logical data is the summation of used blocks, saved blocks, and compressed blocks in the volume. This might prevent running the generic Data ONTAP® 'revert_to' command successfully.

Corrective Action

Shrink the volume or run 'sis revert_to -delete vol_path' to delete deduplication metadata from this volume.

Syslog Message

'sis revert_to' command has failed on volume %s%s. Volume exceeded the maximum allowed logical data limit of %d TB for SIS in the target release.

Parameters

path (STRING): Path to the SIS volume.

volident (STRING): To uniquely identify the volume in cases where the volume name itself is insufficient.

maxVolSize (INT): Maximum size of the SIS volume in the target release.

sis.revert.to.space.warning

Severity

INFORMATIONAL

Description

This message occurs when a Single Instance Storage (SIS) volume command 'sis revert_to' is run. This message indicates that adding more data during this command execution might abort that operation due to insufficient space.

Corrective Action

(None).

Syslog Message

Adding data to volume %s%s while the 'sis revert_to' command is running might lead to insufficient free space and failure of that operation.

Parameters

path (STRING): Path to the SIS volume.

volident (STRING): To uniquely identify the volume in cases where the volume name itself is insufficient.

sis.revert.to.write.Failed

Severity

ERROR

Description

This message occurs when the Single Instance Storage (SIS) volume command 'sis revert_to' fails to write to a file or create a file related to a revert_to operation. This might prevent running generic Data ONTAP® 'revert_to' command successfully

Corrective Action

Ensure that space is available in the indicated volume or in the aggregate it belongs to. After space is available, rerun the 'sis revert_to' command.

Syslog Message

'sis revert_to' command failed on volume %s%s :%s.

Parameters

path (STRING): Path to the SIS volume.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

reason (STRING): Reason for the failure.

sis.revertmetacreate events

sis.revertmetacreate.failed

Severity

ERROR

Description

This message occurs when Single Instance Storage (SIS) metafiles cannot be created in the flexible volume metadir during a reversion to an earlier version of Data ONTAP®.

Corrective Action

Following this error, SIS is disabled for the volume. After correcting the underlying issue indicated by the error message, enable SIS again using the 'sis on' command. SIS then resumes normally.

Syslog Message

Could not create the metafiles for the volume %s%s in the volume metadir: %s SIS is turned off for this volume.

Parameters

vol (STRING): Path to the volume.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

err (STRING): Reason for the failure.

sis.schedule events

sis.schedule.notify.change

Severity

NOTICE

Description

This message occurs when the Single Instance Storage (SIS) schedule of a volume is changed to the default schedule (sun-san@0) because the node's clusterid does not match with the SIS config clusterid. This can happen when a volume is replicated to a node belonging to another cluster.

Corrective Action

Use the `sis config` command to set a SIS policy on the volume.

Syslog Message

SIS policy for volume %s%s is no longer valid because of the clusterid mismatch. SIS schedule is set to the default schedule `sun-sat@0`.

Parameters

volume (STRING): Volume name.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.schedule.notify.change.compression

Severity

NOTICE

Description

This message occurs when a volume with background compression has an auto type policy. The policy is replaced with a default schedule (`sun-sat@0`). This can happen when a volume is being re-mounted during which efficiency policy type is changed to auto.

Corrective Action

Use the `volume efficiency modify` command to set a efficiency policy on the volume. For example: `volume efficiency modify -volume volume-name -policy policy-name`

Syslog Message

Efficiency policy for volume %s%s is auto type and is not supported with background compression. The schedule is set to the default schedule `sun-sat@0`.

Parameters

volume (STRING): Volume name.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.schedule.notify.change.snapmirror

Severity

NOTICE

Description

This message occurs when a SnapMirror® relationship spanning across Vservers breaks. In such cases, the efficiency policy on the destination is no longer valid; it is replaced with the default schedule (`sun-sat@0`).

Corrective Action

Use the `'volume efficiency modify'` command to set a efficiency policy on the volume. For example: `volume efficiency modify -volume volume-name -policy policy-name`

Syslog Message

Efficiency policy for volume %s%s is not valid and has been replaced with default schedule (`sun-sat@0`).

Parameters

volume (STRING): Volume name.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.undo events

sis.undo.aborted

Severity

ERROR

Description

This message occurs when a SIS volume 'undo' operation is aborted due to unexpected conditions.

Corrective Action

(None).

Syslog Message

SIS undo operation for '%s%s' has aborted: '%s'.

Parameters

path (STRING): Path to a SIS volume.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

err (STRING): Error message.

sis.undo.aborted.inconsistent

Severity

ALERT

Description

This message occurs when a SIS volume 'undo' operation is aborted due to volume inconsistency.

Corrective Action

Run waflliron to remove inconsistencies in the volume, then retry the operation.

Syslog Message

SIS 'undo' operation for '%s%s' has aborted due to volume inconsistencies.

Parameters

path (STRING): Path to a SIS volume.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.undo.done

Severity

NOTICE

Description

This message occurs when 'sis undo -t wrong' command removes the sharing on improperly shared inodes.

Corrective Action

(None).

Syslog Message

The 'sis undo -t wrong' command removed sharings on improperly shared inodes in the volume '%s%s'. Details about cleaned inodes are available at '%s'.

Parameters

volume (STRING): Volume name.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

log_location (STRING): SIS undo log location.

sis.undo.nospace

Severity

ERROR

Description

This event is issued to indicate that there is not enough free space to undo the shared blocks on a SIS volume. The undo operation will be aborted. Data blocks that were still shared at the time the undo operation stopped will remain shared. Blocks already processed by the undo operation are no longer shared.

Corrective Action

Free disk space in the volume, or increase the size of the volume, then retry the operation.

Syslog Message

Undoing shared blocks on volume %s%s has aborted because there is insufficient free space. Data blocks that were still shared at the time the undo operation stopped will remain shared. Blocks already processed by the undo operation are no longer shared.

Parameters

vol (STRING): Path to a SIS volume

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.undo.required

Severity

NOTICE

Description

This message occurs when 'sis undo -t wrong -d' command finds improperly shared inodes.

Corrective Action

Run the 'sis undo -t wrong' or 'sis undo -i' command to remove improperly shared inodes.

Syslog Message

The 'sis undo -t wrong -d' command detected improperly shared inodes in the volume '%s%s'. Run the 'sis

undo -t wrong' or 'sis undo -i' command to remove improperly shared inodes. Details about improperly shared inodes are available at '%s'.

Parameters

volume (STRING): Volume name.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

log_location (STRING): SIS undo log location.

sis.undo.started

Severity

INFORMATIONAL

Description

This message occurs when a SIS undo operation is started.

Corrective Action

(None).

Syslog Message

SIS undo operation for %s%s has started.

Parameters

path (STRING): Path to a SIS volume.

volident (STRING): Uniquely identifies the volume when the volume name alone is insufficient.

sis.undo.stopped

Severity

ERROR

Description

This event is issued when a SIS volume undo operation is stopped by user.

Corrective Action

(None).

Syslog Message

SIS undo operation for %s%s has stopped.

Parameters

path (STRING): Path to a SIS volume

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.upgrade events

sis.upgrade.aggr.metfile.failed

Severity

ERROR

Description

This message occurs when Single Instance Storage (SIS) metafiles cannot be created in the aggregate containing the volume, during a Data ONTAP® upgrade. The aggregate might be full. The 'sis status' command will not display this volume. SIS operations cannot be triggered manually or according to a schedule for the volume.

Corrective Action

Ensure that space is available in the aggregate containing the volume. After correcting the underlying issue indicated by the error message, remount the volume for the SIS upgrade to be triggered again. If the upgrade succeeds, SIS then resumes normally.

Syslog Message

Could not create the metafiles for the volume %s%s : %s.

Parameters

volname (STRING): Volume name.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

err (STRING): Reason for the failure.

sis.upgrade.feature.enable

Severity

NOTICE

Description

This message occurs during upgrade to Data ONTAP® 9.2 or later, when we start enabling Volume Efficiency features on the existing compatible volumes on All-Flash Optimized nodes in the background.

Corrective Action

(None).

Syslog Message

Volume efficiency features will be enabled on Volumes of All-Flash Optimized nodes in the Cluster.

Parameters

(None).

sis.upgrade.feature.enable.done

Severity

NOTICE

Description

This message occurs during upgrade to Data ONTAP® 9.2 or later, when we have completed enabling the Volume Efficiency features on the existing compatible volumes.

Corrective Action

(None).

Syslog Message

Volume efficiency features were enabled on Volumes of All-Flash Optimized nodes in the Cluster.

Parameters

(None).

sis.upgrade.feature.enable.fail

Severity

INFORMATIONAL

Description

This message occurs during upgrade to Data ONTAP® 9.2 or later, when we fail to enable Volume Efficiency features on the existing compatible volume on All-Flash Optimized nodes.

Corrective Action

Manually try enabling the Volume Efficiency features on the volume using the "volume efficiency modify" command.

Syslog Message

Could not enable Volume Efficiency features for Volume %s of vserver %s.%s

Parameters

volume (STRING): Volume name.

vserver (STRING): Vserver name.

reason (STRING): Reason for failure.

sis.upgrade.feature.enabled

Severity

INFORMATIONAL

Description

This message occurs during upgrade to Data ONTAP® 9.2 or later, when we enable Volume Efficiency features on the existing compatible volume on All-Flash Optimized nodes.

Corrective Action

(None).

Syslog Message

Volume Efficiency features enabled on Volume %s of Vserver %s.

Parameters

volume (STRING): Volume name.

vserver (STRING): Vserver name.

sis.upgrademetatile events

sis.upgrademetatile.failed

Severity

ERROR

Description

This message occurs when Single Instance Storage (SIS) metafiles cannot be created during a Data ONTAP® upgrade. The 'sis status' command will not display this volume. SIS operations cannot be triggered manually or according to a schedule for the volume.

Corrective Action

Correct the underlying issue indicated by the error message, and then run 'sis on' command to trigger the SIS upgrade again. If the upgrade succeeds, SIS then resumes normally.

Syslog Message

Could not create the metafiles for the volume %s%s: %s.

Parameters

vol (STRING): Path to the volume.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

err (STRING): Reason for the failure.

sis.verify events

sis.verify.suspended

Severity

NOTICE

Description

This message occurs when the system suspends a Single Instance Storage (SIS) volume checking operation to to run a queued SIS operation.

Corrective Action

(None).

Syslog Message

(None).

Parameters

path (STRING): Path to the SIS volume.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

sis.vol events

sis.vol.auto.promote

Severity

NOTICE

Description

This message occurs when deprioritized volume gets auto promoted.

Corrective Action

(None).

Syslog Message

Volume "%s" is auto promoted: Percentage of writes happened in this window (%d%%) and percentage of dedupe savings (%d%%).

Parameters

vvol_name (STRING): Volume name.

inline_process_pct (INT): Percentage of writes happened after one window.

inline_saving_pct (INT): Percentage of inline dedupe savings in each window.

sis.vol.overwrite.depri**Severity**

NOTICE

Description

This message occurs when automatic deduplication deprioritizes a volume due to a large number of overwrites in the block fingerprint log file.

Corrective Action

(None).

Syslog Message

Automatic deduplication on volume "%s" is deprioritized: percentage of overwrites in the fingerprint log file is %d%%.

Parameters

vvol_name (STRING): Volume name.

stale_pct (INT): Percentage of cumulative stale fingerprints after the fifth iteration of automatic deduplication runs.

sis.vol.savings.depri**Severity**

NOTICE

Description

This message occurs when automatic deduplication deprioritizes a volume due to potentially low storage efficiency savings.

Corrective Action

(None).

Syslog Message

Automatic deduplication on volume "%s" is deprioritized: low background savings (%d%%), low cross volume deduplication savings (%d%%) and low inline savings (%d%%) when compared total with minimum required (%d%%) .

Parameters

vvol_name (STRING): Volume name.

bkg_savings (INT): Background deduplication savings realized after the fifth iteration of automatic deduplication runs.

cvbd_savings (INT): Cross Volume deduplication savings realized on the volume.

inline_savings (INT): Inline deduplication savings realized on the volume.

min_savings_req (INT): Min Savings required

sis.vol.verify.depri

Severity

NOTICE

Description

This message occurs when automatic deduplication deprioritizes a volume due to a large number of stale fingerprint removal operations on the volume.

Corrective Action

(None).

Syslog Message

Automatic deduplication on volume "%s" is deprioritized: significant percentage of stale fingerprint removal operations (%d%%).

Parameters

vvol_name (STRING): Volume name.

high_verify_pct (INT): Percentage of cumulative stale fingerprint removal operations after the fifth iteration of automatic deduplication runs.

sis.wafiron events

sis.wafiron.required

Severity

ALERT

Description

This message occurs when a requested SIS volume 'undo' operation fails to correct on-disk corruption and requires wafiron to be run.

Corrective Action

Start wafiron (Command Line: 'aggr wafiron start'. See 'aggr help wafiron' for help) to correct on-disk corruptions after completion of current 'sis undo' operation on the volume.

Syslog Message

SIS 'undo' command detected on-disk corruption while working on unshare request. Run wafiron for volume '%s%s' of aggregate '%s' after completion of current 'sis undo' operation on the volume. See 'aggr help wafiron' for options on running wafiron.

Parameters

volume (STRING): Name of the affected volume.

volident (STRING): To uniquely identify the volume in cases where volume name itself is insufficient.

aggregate (STRING): Aggregate name containing the affected volume.

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