Storage & Containers

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Containers & Pools

Storage Containers

List all storage containers

```
ncli container list
```

Create a new container

```
ncli container create name=<name> sp-name=<storage_pool>
```

Edit container properties (e.g. replication factor, compression)

```
ncli container edit name=<name> ...
```

Storage Pool

List storage pools

```
ncli sp ls
```

Other

Check local filesystem usage on the CVM

```
df -h
```

List a container's contents via NFS (debug)

```
nfs_ls
```

Local Disks

Local Disks (CVM/Host)

List SCSI/SATA block devices (drives, optical)

```
lsscsi
```

List partitions on a disk

```
fdisk -l /dev/sda
```

List block devices with their mappings

```
lsblk
```

Check a disk for SMART errors

```
smartctl -a /dev/<disk>
```

Cassandra

Cassandra (Metadata)

Cassandra token ring on the local CVM. Normal output: an even load of keys across the cluster. A newly added node shows as LIMBO while metadata is being redistributed

```
nodetool -h localhost ring
```

Same, for all CVMs at once

```
for i in `svmips` ; do ssh $i "source /etc/profile ; nodetool -h localhost ring" ; done
```

Column family statistics

```
nodetool -h 127.0.0.1 cfstats
```

Stargate & vDisks

Extent Store / vDisks (medusa_printer)

Find which vDisk an extent group belongs to

```
medusa_printer -egroup_id=<EXTENTGROUPID> -lookup=egid
```

Get all extent groups for a given vDisk

```
medusa_printer --scan --lookup=egid --vdisk_id=<VDISK_ID> --print_values_for_scan | less
```

Count oplog episodes for a vDisk

```
medusa_printer -lookup oplog -vdisk_id <VDISK_ID> | grep episode | wc -l
```

Stargate

Stargate version

```
stargate --version
```

Where extent data lives on a CVM

```
/home/nutanix/data/stargate-storage/disks/
```

iostat-like per-vdisk / per-disk stats (stargate_stats.py, ships with AOS / KB-2629)

```
stargate_stats.py -t vdisk -n 1 | (head -n 1 && tail -n +2 | sort -n -rk 10 | head)
stargate_stats.py -t disk -x 5
```