# Resource Utilization Report

| | |
|---|---|
| **Customer:** | Complex Inc. |
| **Report Date:** | Sep 01, 2011  -  Sep 15, 2011 |
| **Device Class(es):** | Windows Server |
| **Rule(s):** | Complex Inc. Devices |
| **Device(s):** | COMPLEX1 |
| | CORESRV |

## CPU Usage

During business operating hours, if the average CPU utilization is below 30%, the server is operating within acceptable parameters and the server is well matched to the tasks it is assigned. An average CPU utilization of between 30% and 70% indicates that the machine is quite busy and performance may be impacted during peak operating times. An average CPU utilization of over 70% indicates that the machine's resources are overtaxed and require an upgrade or reassignment of tasks.
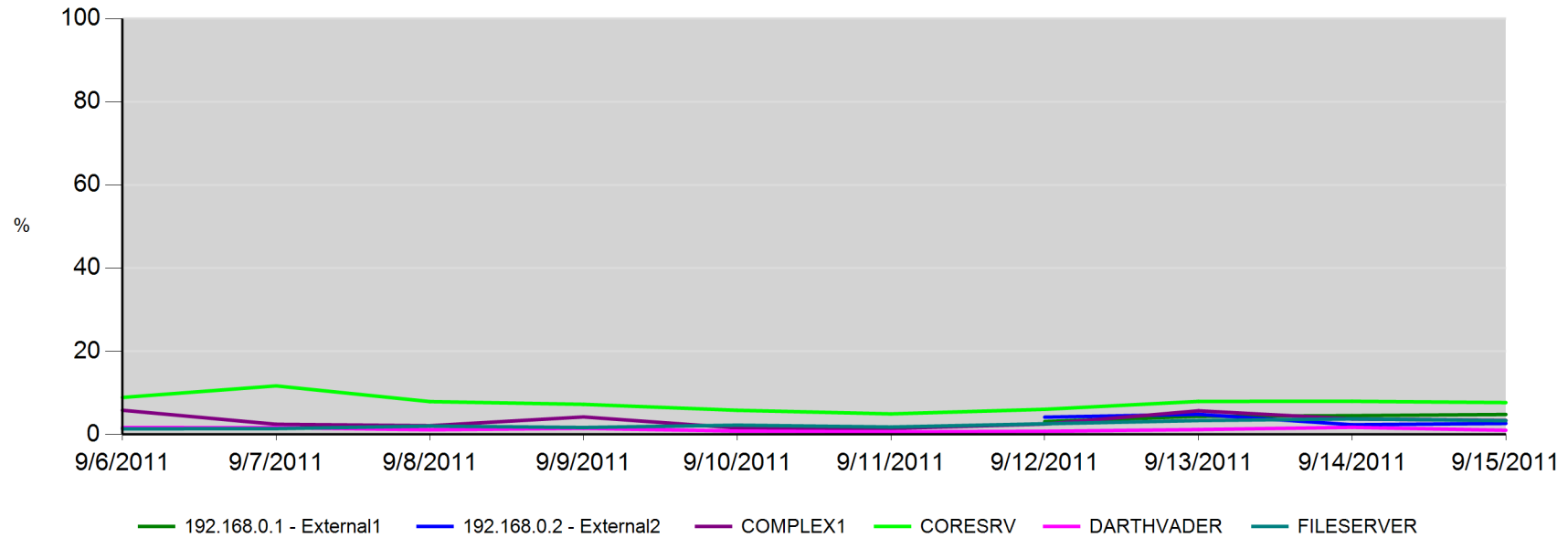


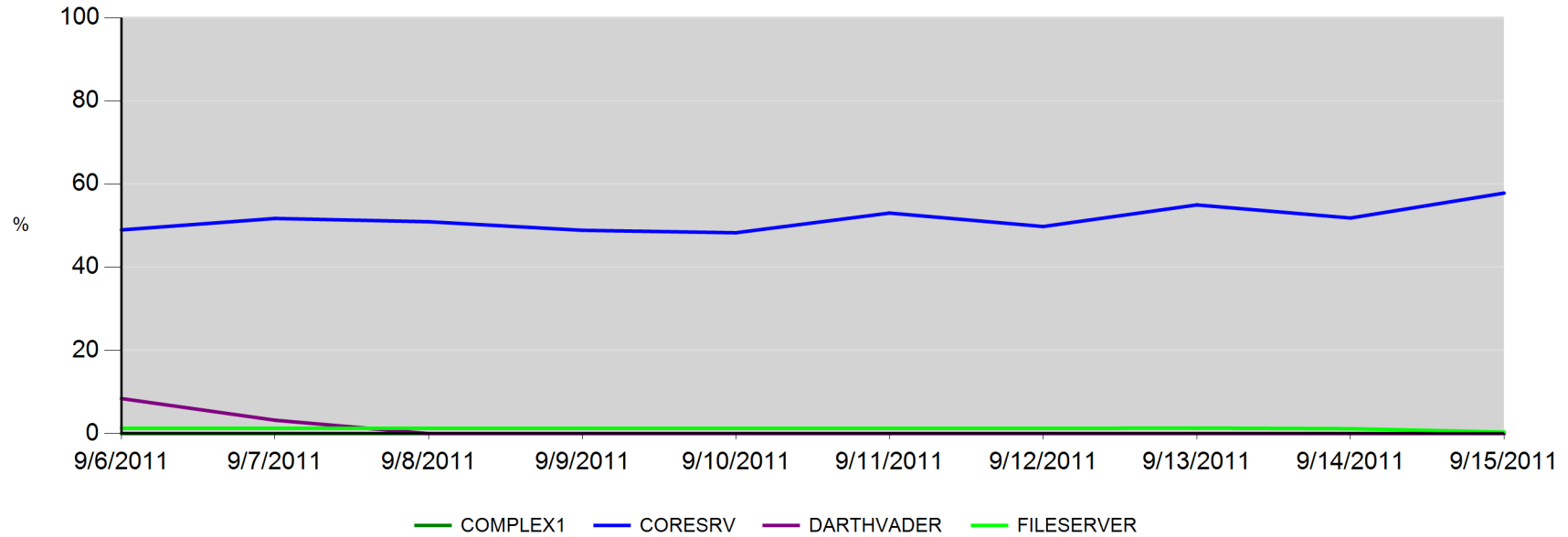| Device Name | CPU Average Usage (%) | | |
| --- | --- | --- | --- |
| | Lowest Hourly | Highest Hourly | Overall |
| CORESRV | 0.00 | 49.55 | 7.55 |
| 192.168.0.1 - External1 | 1.08 | 21.67 | 4.44 |
| 192.168.0.2 - External2 | 1.00 | 16.31 | 3.41 |
| COMPLEX1 | 0.00 | 38.00 | 3.17 |
| FILESERVER | 0.00 | 24.92 | 2.44 |
| DARTHVADER | 0.00 | 15.83 | 1.20 |

## Physical Memory Usage

High physical memory usage is not necessarily an indicator of poor performance. Some applications, such as Microsoft Exchange Server and Microsoft SQL Server, will use as much physical memory as is available. When viewing memory utilization on these devices, virtual memory utilization is more indicative of issues. Overall, excessively high utilization of both physical & virtual memory indicates a need for memory to be added to the system.



Legend: 192.168.0.1 - External1 — 192.168.0.2 - External2 — COMPLEX1 — CORESRV — DARTHVADER — FILESERVER
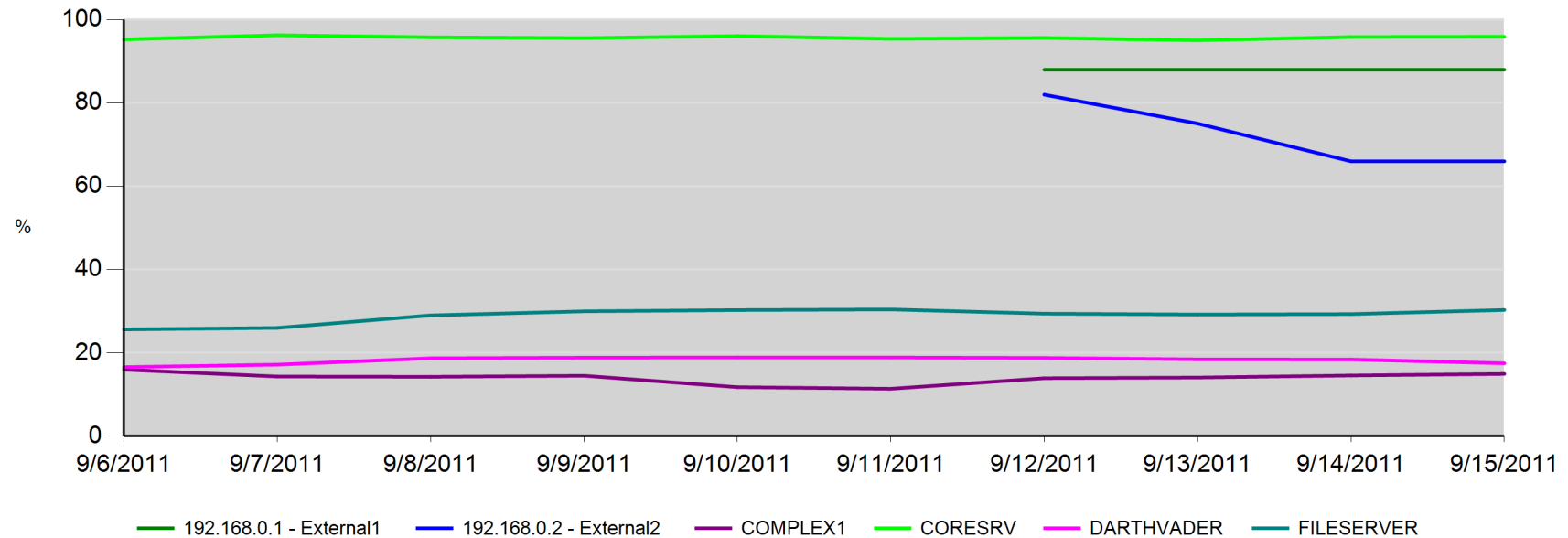
| Device Name | Memory Size | Physical Memory Average Usage (%) | | |
| --- | --- | --- | --- | --- |
| | | Lowest Hourly | Highest Hourly | Overall |
| CORESRV | 12288 MB | 88.87 | 98.24 | 95.71 |
| 192.168.0.1 - External1 | 0 MB | 88.00 | 88.00 | 88.00 |
| 192.168.0.2 - External2 | 0 MB | 66.00 | 82.36 | 70.47 |
| FILESERVER | 12279 MB | 25.53 | 32.55 | 29.18 |
| DARTHVADER | 12279 MB | 16.45 | 19.68 | 18.35 |
| COMPLEX1 | 12288 MB | 10.65 | 17.89 | 13.86 |

## Virtual Memory Usage

High virtual memory utilization indicates that the system is busy paging to swap and it can reach the state in which it is not able to keep up with demand. Excessively high utilization of virtual memory indicates a need for memory upgrade.



| Device Name | Memory Size | Virtual Memory Average Usage (%) | | |
| --- | --- | --- | --- | --- |
| | | Lowest Hourly | Highest Hourly | Overall |
| CORESRV | 12287 MB | 43.47 | 68.39 | 51.83 |
| FILESERVER | 12279 MB | 0.13 | 1.36 | 1.18 |
| DARTHVADER | 13307 MB | 0.00 | 8.53 | 0.71 |
| COMPLEX1 | 12287 MB | 0.00 | 0.00 | 0.00 |

## Disk Usage

The amount of disk space available varies widely from server to server. Fileservers for home folders require more disk space available than DNS servers. However, disk space as a rule should not exceed 80% utilization on any volume.



— COMPLEX1 - C:    — CORESRV - C:    — CORESRV - D:    — DARTHVADER - C:    — FILESERVER - C:
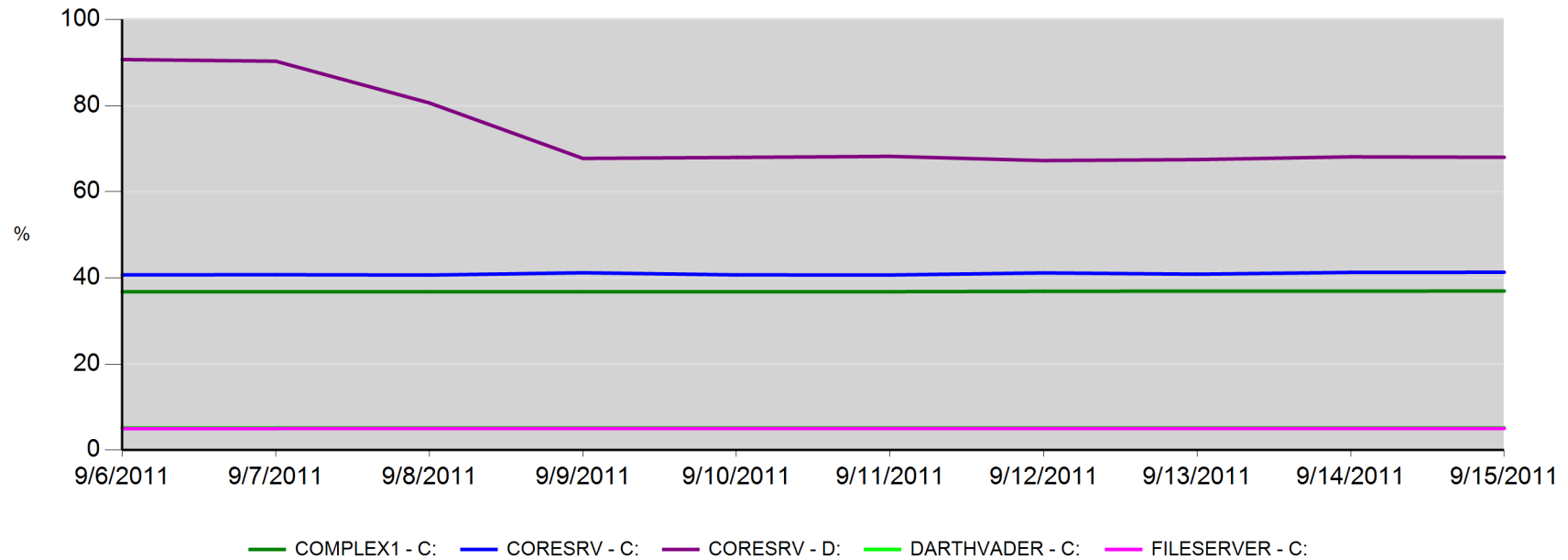
| Device Name | Disk Volume | Disk Size | Disk Average Usage (%) | | |
| --- | --- | --- | --- | --- | --- |
| | | | Lowest Hourly | Highest Hourly | Overall |
| CORESRV | D: | 600.00 GB | 66.62 | 90.68 | 72.64 |
| CORESRV | C: | 199.90 GB | 39.71 | 41.80 | 40.92 |
| COMPLEX1 | C: | 99.90 GB | 36.77 | 39.02 | 36.83 |
| DARTHVADER | C: | 1862.92 GB | 5.08 | 5.22 | 5.20 |
| FILESERVER | C: | 596.08 GB | 5.01 | 5.47 | 5.03 |