



Deep Security is an IT life-saver at Ireland's renowned Beaumont Hospital

Overview

With 3,000 staff and 820 beds, Dublin's Beaumont Hospital is the second largest hospital in the Republic of Ireland. It is the National Referral Centre for Neurosurgery and Neurology, Renal Transplantation, and Cochlear Implantation, the principal teaching hospital for the Royal College of Surgeons in Ireland, and is closely links with Dublin City University in the area of nurse training.

The Beaumont operates a VMware environment of vCenter servers managing ESX hypervisors, running over 260 virtual machines. This infrastructure enables the IT team to deliver virtual servers and desktops to senior clinical staff off-site in a highly efficient manner, with all the attendant benefits of VDI including rapid deployment of updates, ease of management, lower power usage, lower hardware expenditure' and a unified desktop environment.

The team is currently in the process of upgrading its infrastructure to ESX 5.1 on vCenter 5.5 servers, including upgrades to the fibre switching.

Challenges

The IT team discovered servers were sluggish and slow to respond at certain times of the night. After consulting with IT partner Triangle Computer Services to assist with diagnosis, the Antivirus (AV) solution used by Beaumont was found to be the root cause. Put simply, the AV tool's server scans were eating up resources, causing huge CPU spikes which led to unusably slow network speeds. Virtual machines even lost connectivity for periods.

The challenge is a common one for security products which are simply not designed for virtual environments and treat VMs as physical machines, causing these so-called "security storms".

Solution

Based on their experience with other clients, Triangle suggested a hypervisor based security solution. After seeing a demo of Trend Micro Deep Security, the IT team proceeded to a proof of concept, running alongside their existing provider. This delivered an immediate improvement, and the decision was made to proceed to rollout with the assistance of Triangle. Deep Security features an agentless architecture for VMware virtual machines, handing over resource-intensive tasks like antivirus and other security scans to a dedicated, security-hardened virtual appliance. It also offers virtual patching, integrity monitoring, log inspection, firewalling, web security, plus it also deploys policy and scans any new VMs automatically to address instant-on gaps and inter-VM attacks.

Benefits

Installing Trend Micro Deep Security caused a noticeable improvement in the Beaumont Hospital's VMware environment. Operationally there was no discernible hit to performance or any related network problems. In short, clinical staff was able to reap all the rewards of desktop virtualisation with no risk of a technology malfunction impeding their productivity.

For the IT department it has also improved troubleshooting—allowing the team to rule out their AV product as the cause of any future performance problems. They have also been impressed with the customisable dashboard interface of Deep Security, which allows admins to manage the entire virtual security environment from a single pane of glass.

What's Next

The hospital has replaced its previous AV products with Deep Security on all hosts and virtual server/desktops as part of the VMware refresh. The product has performed so well that the IT department is considering rolling out Trend Micro for its physical desktops as well, although any decision on that front will come only once the current upgrade project has been completed.

>> Beaumont Hospital, Dublin

Region

EMEA-Ireland

Sector

Healthcare

Employees

3000

Trend Solutions

- Deep Security

Business Benefits

- Noticeable improvement in the hospital's VMware Environment
- Improved troubleshooting
- Ability to manage the entire virtual environment from a single pane of glass

“For us, Trend Micro is at the top of its game when it comes to security virtualisation—I believe no-one can touch them.”

David Kelly,
Virtualisation Manager
at Beaumont Hospital