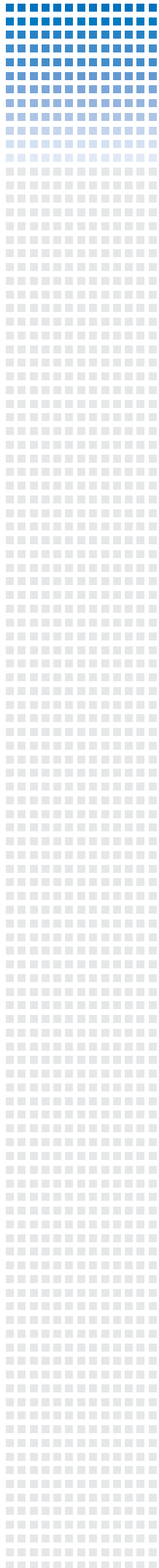


AscenVision
Success of AscenLink in
University of
Francisco de Vitoria



Executive Summary

The university Francisco de Vitoria wants to improve the slow internet access in their laboratories and justify the solution for the entire campus network optimization and rollout of campus wireless network. AscenLink, the industry-leading WAN link load balancer, is chosen to achieve an accelerated network with constant reliability and continuity in labs. With AscenLink's bidirectional bandwidth management, ease-of-deployment nature, intuitive user interface, and so on, the university provides students with optimal network conditions for a more streamlining learning and communication environment.

Overview

The University Francisco de Vitoria (UFV) was established in 1993 as part of University of Madrid and became private in 2001. Like many high education institutions, UFV takes advantage of the Intranet and Internet to improve the efficiency of learning, communication, and other educational business activities. The UFV network serves thousands of students and hundreds of faculty and non-faculty staff. The rapid increase in network demands drives UFV to enhance its network environment for higher throughput, accelerated network and application performance, and maximum bandwidth utilization.

The UFV network optimization project falls into three phases: improving network environment in labs, optimizing the entire campus network, and deploying a campus wireless network. This case study is based on the first phase focusing on the efforts to expand the network bandwidth, load balance inbound and outbound traffic, and manage traffic patterns to provide overall improvement to the network environment in laboratories.

Challenge

Students taking classes in laboratories always complain about the slow Internet access. The IT department of UFV has already deployed several WAN links, but the connection speed remains slow still. After careful analysis on the existing network, the IT department finds out four main issues of the laboratory network:

[Challenge 1]

How to ensure constant connectivity with sufficient throughput

The existing network infrastructure in the labs presents the single point of failure, which suffers the potential risk of service disruption. In addition, the fluctuated internet connection leads to negative impacts on learning and communication between instructors and students.

[Challenge 2]

How to prevent network congestion from heavy traffic flows

UFV provides various services in the labs, such as interactive learning applications, web portals to different school/faculty systems, web spaces for file saving, printing services, WWW services for academic researches, and so forth. Network congestion could take place at any peak time due to too much traffic from too many concurrent users and the lack of traffic management.

[Challenge 3]

How to achieve a network solution with transparent deployment

The daily academic operation depends heavily on the internal network and the Internet, so that it is unrealistic to suspend the network services for the network improvement deployment. A transparent solution, therefore, is a high priority requirement for UFV.

[Challenge 4]

How to achieve a cost-effective solution

UFV spends thousands of Eurodollars every year on the deployment of Internet lines. They expect to achieve a most effective network optimization solution with least investment, as often times true for all other customers!

AscenLink as the Solution

“We are so grateful to AscenLink that it delivers us a robust network in labs with constant reliability, sufficient capacity, and reduced number of WAN links,” said Jesus Otero, the Technical Manager of the University Francisco de Vitoria, “and more delightedly, we seldom hear about students’ complains about the slow Internet access or loss of Internet access since the deployment of AscenLink.”

UFV looks for a cost-effective solution capable to take full advantage of multiple WAN links in an optimal manner, ensuring network continuity against the contingent WAN link failure, and improving the Internet access in laboratories. AscenLink is eventually chosen as UFV’s WAN traffic management solution due to its versatility, manageability, and best price performance ratio in its class.

The detailed deployment of AscenLink is as follows:

1. Aggregation of multiple WAN links for expanded bandwidth, load balancing, and fault tolerance

AscenLink aggregates multiple WAN links from different ISPs to achieve best utilization of the combined network resources. With the intelligent “Auto Routing” feature, traffic flows are delivered via different links according to the preset policies. Furthermore, the WAN link health detection (WLHD) feature can automatically detect the failure of any one of the WAN links, and then AscenLink’s failover mechanism is activated to redirect the traffic on the failed link to the healthy ones transparently. The internet connection, therefore, remains intact for non-stop services. After the recovery of the abnormal link, AscenLink will take the full advantage of all WAN links again and deliver the information in the most efficient manner.

2. Proper bandwidth management for improved application performance and most efficient lab activities

AscenLink offers both inbound and outbound bandwidth management, which enables the MIS personnel to reserve sufficient bandwidth or prioritize critical applications for maximum performance. UFV also deploys a proxy-cache from BlueCoat to retrieve repetitive information from the local host instead of a remote server. This is because that students often times generate same requests for a certain subject. Besides, Websense is also installed to filter inappropriate web contents and enhance the security level. The combination of AscenLink's bandwidth management, BlueCoat's proxy-cache, and Websense effectively maximizes the efficiency of students' lab activities.

3. Ease-of-deployment and ease-of-administration

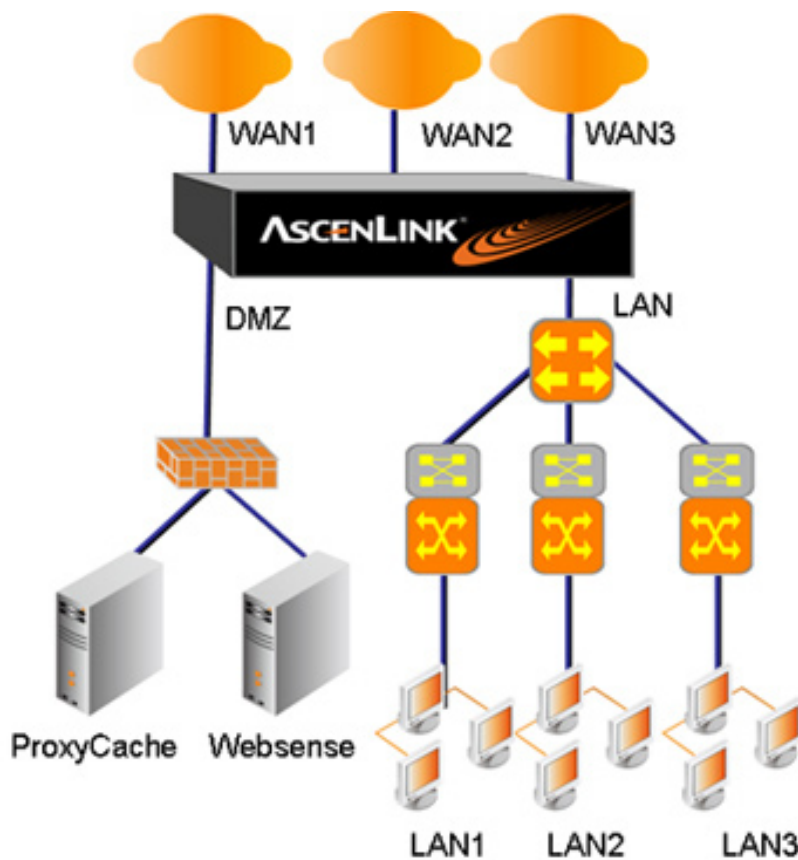
AscenLink can be seamlessly integrated into the UFV's campus network without significant changes to the existing network configuration. In addition, the intuitive web-based user interface offers policy-based administration and central management framework, which saves lots of time and efforts for the MIS personnel in daily network administration and maintenance.

4. Cost-saving

AscenLink achieves sufficient bandwidth expansion with less number of WAN links deployed, which cuts down large amount of IT operational costs for UFV. Moreover, AscenLink offers the best-in-breed price performance ratio, enabling UFV to enjoy an equivalent or even more advanced WAN traffic management solution at a much more comparable price.

5. Scalability

The virtual WAN link support enables UFV to deploy more WAN links for bandwidth expansion in the future. In addition, if UFV extends its campus to various geographical locations in the future, AscenLink's patented feature "Tunnel Routing" can help UFV achieve a supercharged Intranet across the WAN.



UFV Laboratory Network

Summary

AscenLink, the integrated WAN traffic management solution, helps UFV achieve a constantly reliable and available network in labs with lowest total cost of ownership. Students in the labs can enjoy non-stop and accelerated internet services for efficient and effective learning and communication experiences.

The success of AscenLink in UFV campus network once again showcases that AscenLink is the best choice for organizations, regardless of the industry segments, to achieve complete and trustworthy WAN traffic management solutions in a cost-effective manner. With typical features such as Load Balancing, Fault Tolerance, and Optimum Route, plus user-centered value-add services such as Tunnel Routing, Multihoming, Connection Limit, and so on, AscenLink and its complete product line present comprehensive and cost-effective network solutions to enterprises in any scale.

About AscenVision

AscenVision Technology is a leading network device and solution provider, with the corporate goal to ascend the network technologies with a vision to provide intelligent network solution to the mass market. By applying these technologies, AscenVision designs and builds highly reliable and efficient network devices as network infrastructure building blocks to improve WAN traffic management, security, and performance.

For more information about AscenVision, please visit: <http://www.ascenvision.com/>

Released in Feb. 2007