

Customer:



Pražská akademická počítačová síť

Members of PASNET Association

- ▶ Charles University in Prague
- ▶ Czech Academy of Sciences
- ▶ Czech University of Technology in Prague
- ▶ University of Economics in Prague

Industry:

Academic high-speed metropolitan network

Challenges:

- ▶ 100 000+ users
- ▶ Dozens of other subjects
- ▶ 200+ locations
- ▶ Hundreds of servers
- ▶ Connectivity 2x10Gbps
- ▶ 10Gbps backbone network
- ▶ Visibility into traffic on the PASNET network interface
- ▶ Anomaly detection of network traffic

Solution:

- ▶ Flowmon probes
- ▶ Flowmon collectors

Benefits:

- ▶ Excellent visibility into the network and reporting
- ▶ Automation of processes of network administration and security
- ▶ The possibility of quick detection of network traffic problems and anomalies
- ▶ More efficient network administration and control

Contact:

- ▶ <http://www.pasnet.cz>

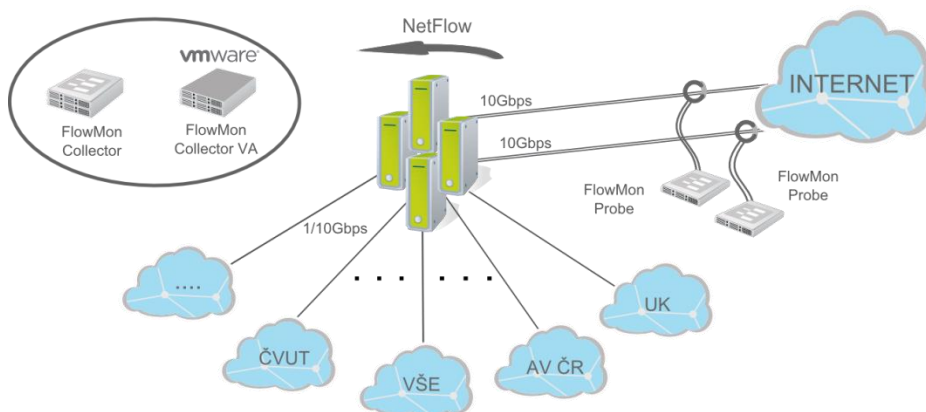
Prague Academic Computer Network PASNET is a high-speed metropolitan network intended for the transmission of general digital data operated by PASNET Association. It is primarily used to connect local computer networks of Prague universities and Czech Academy of Sciences and their Internet connection. However, PASNET offers its services to other entities, mainly from academic sphere.

Infrastructure

The backbone of the network uses optical fibers and CWDM technology. To ensure the necessary transmission capacity and required services the technology 10Gbps Ethernet is deployed. PASNET network is connected to the Internet via the large infrastructure which is operated by CESNET association. Network administration including continuous emergency service is ensured by PASNET Operation Center that is set up within the Institute of Information Technology of Charles University in Prague.

Deployment

PASNET Association is connected to the Internet via two optical 10Gbps lines (EtherChannel). Each line is monitored separately by one probe Flowmon Probe 20000 SFP+ containing two monitoring ports for connection through the TAP. Flowmon Collector with 4TB capacity is used for the long-term storage of traffic statistics. In the virtual environment a Flowmon Collector in form of a virtual appliance is deployed and is used for quick analysis of incidents that occur during the previous 48 hours.



Customer Review

Mr. Frantisek Potuznik evaluates the deployment of Flowmon Solution:

“Deployed Flowmon Solution within PASNET network is used the most during security incidents solving in the member or customer networks. I see the main benefit primarily in the possibility of rapid detection of source of the problem in the case of attacks or traffic anomalies that negatively influence quality and availability of provided services. Finally, the Flowmon solution is used to provide synoptic reports about traffic of customer networks into the Internet based on individual requirements of administrators of these networks.”