Sansbound / Koti Concepts: Fortigate Firewall Syllabus

A. Switching concepts on Fortigate firewall

1. Configuration of Layer 2 Ethernet interfaces
2. Configuration of Layer 2 Ethernet sub interfaces
3. Configuration of Layer 3 Ethernet interfaces
4. Configuration of Layer 3 Ethernet sub interfaces
5. Configuration of VLans and VLan interfaces
6. Configuration of Inter-VLan routing using VLan interfaces
7. Configuration of Inter-VLan routing using Ethernet Layer 3 sub interfaces
8. Verify the Mac address table on Fortigate firewall
9. Software and Hardware Switch on Fortigate firewall

B. Routing concepts on Fortigate firewall

1. Configuration of interfaces with IP addresses and verifying the routing table
2. Configuration of Static routing
3. Configuration of Dynamic routing with Routing Information Protocol (RIP)
4. Configuration of Dynamic routing with Open Shortest Path First (OSPF)
5. Configuration of Dynamic routing with Border Gateway Protocol (BGP)
6. Configuration of Redistribution of routes between the Routing protocols
7. Configuration of GRE tunnels
8. Configuration of Static routes with Path monitoring
9. Configuration of Multiple ISP redundancy
10. Configuration of Policy based forwarding (PBF)
11. Configuration of Multiple ISP redundancy

C. Network AddressTranslation

1. Configuration of Dynamic NAT with the source IP getting translated to an Interface IP address
2. Configuration of Dynamic NAT with the source IP getting translated to a pool of IP addresses
3. Configuration of Static NAT
4. Configuration of Destination NAT
5. Configuration of NAT with session distribution

6. Configuration of NAT with port forwarding
7. Configuration of Proper Security policies
8. Configuration of Central NAT

D. Authentication (User-ID)

1. Authentication against the Local Database
2. Configuration of Captive Portal
3. Authentication against Active directory

E. Site to Site VPN IPSec VPN

1. Understanding the basics of Cryptography
2. IPSec Protocols
   • Encapsulating security Payload
   • Authentication Header
3. Role of IKE in IPSec
4. Configuration of Site-to-Site VPN between two different Fortigate firewalls
5. Configuration of Site-to-site VPN between Fortigate and Palo Alto firewalls

F. Site to Client VPN or Remote access VPN

1. Configuration of Remote access SSL VPN with Forticlient

G. High Availability

1. Configuration of Active and passive High availability

H. Miscellaneous Topics

1. Configuration of the management interface
2. DHCP concepts on Fortigate Firewall
3. Configuration of Administrators
4. Configuration of Link aggregation
5. Configuration of Zones
6. Configuration of File Filter in Fortigate firewall

I.   URL filtering ,DNS Filtering , Application control
J. Next Generation Firewall features and Content security
K. Centralised management with Fort Manager
L. Troubleshooting with Debug commands and Sniffer

Training Methodology

The entire training is practical oriented. The concepts are explained and demonstrated on real life case studies.

Trainer

The course is designed and conducted by Koti, trainer at Koti

Profile of the Trainer

Koti started teaching computer networking courses from 1998. He started an organization called "Sans Bound Solutions Private Limited", at Chennai, India in 1999. He was a very popular trainer for CCNA and Network Security courses in Chennai. His classes attracted around 130 students in each batch. Sans Bound had a very large lab setup with around 700 routers, 800 systems and other equipment for students to practice on the lab case studies.

While he was teaching at Sansbound, he used to also conduct very high-end workshops on Routing, Switching, Network Security. His two-day workshops conducted at various places in India and abroad used to attract more than 200 students. When Koti conducted a workshop on Network security at Chennai trade center around 2000 students participated!

He started another organization by name "Koti Concepts" around 8 years back at Bangalore, to teach high-end courses in networking.

The courses he taught include,

CCNA, CCNP, CCIE
Network security with firewalls

Checkpoint firewall

Palo Alto Firewall

ASA Firewall

Juniper firewall

F5 Load Balancer

TCP/IP Protocols

BGP/MPLS

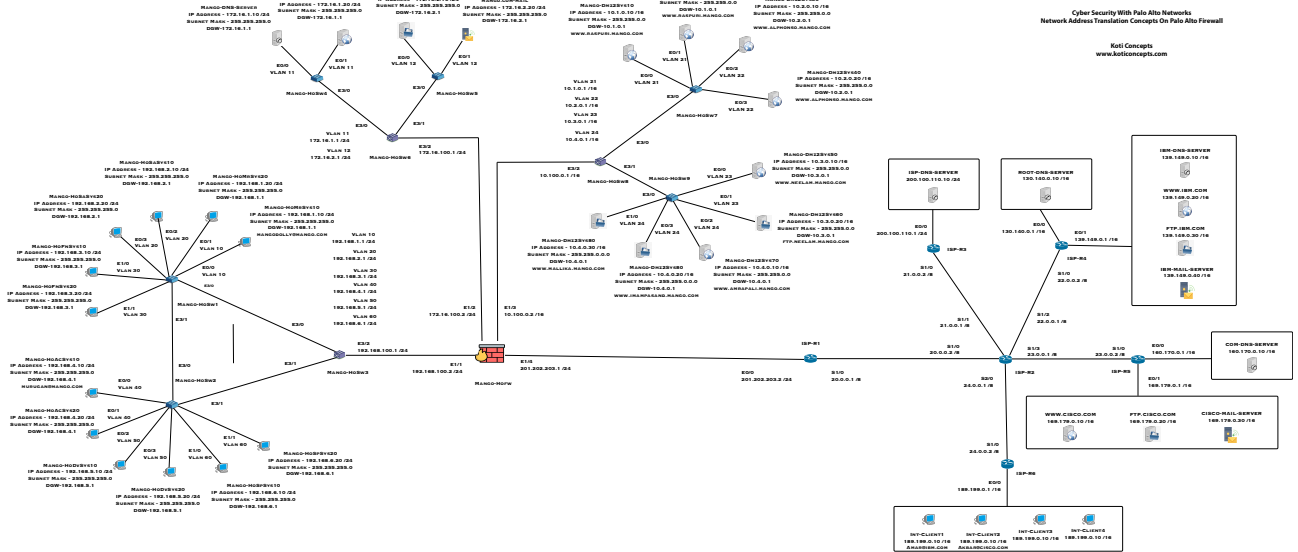Koti also conducts corporate training to various organisations

Koti Website

The classroom recordings of these classes are made available for access to the students on the website, www.koticoncepts.com

Photo Gallery

Network Security Workshop Conducted at Chennai

Network Security Workshop Conducted at Bangalore

Network Security workshop conducted for Railway Officials at Chennai

Network Security Workshop Conducted at Chartered Accountants Institute, Chennai

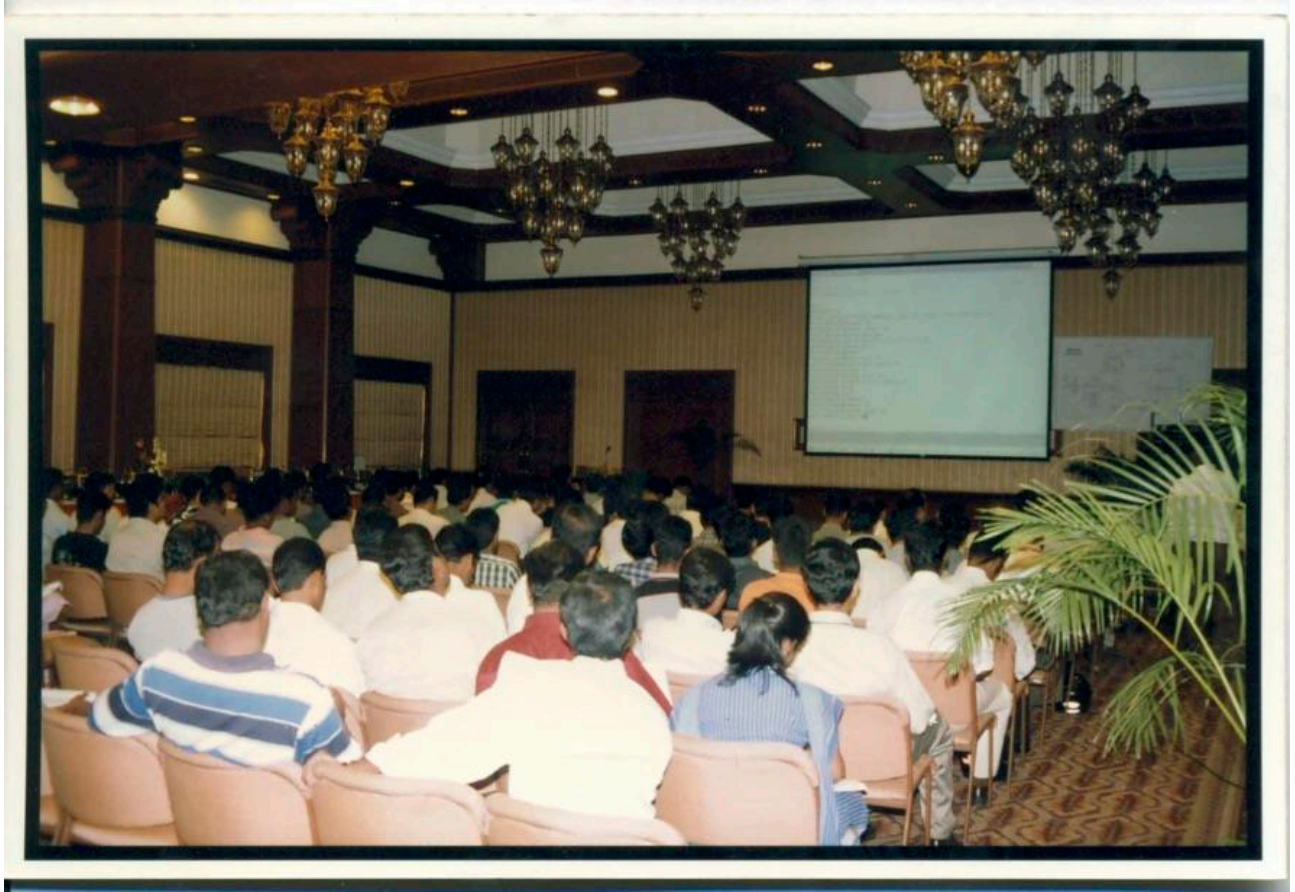Workshop on Cyber Security conducted at Chennai Trade Center

Workshop on Ethical Hacking conducted at Chennai
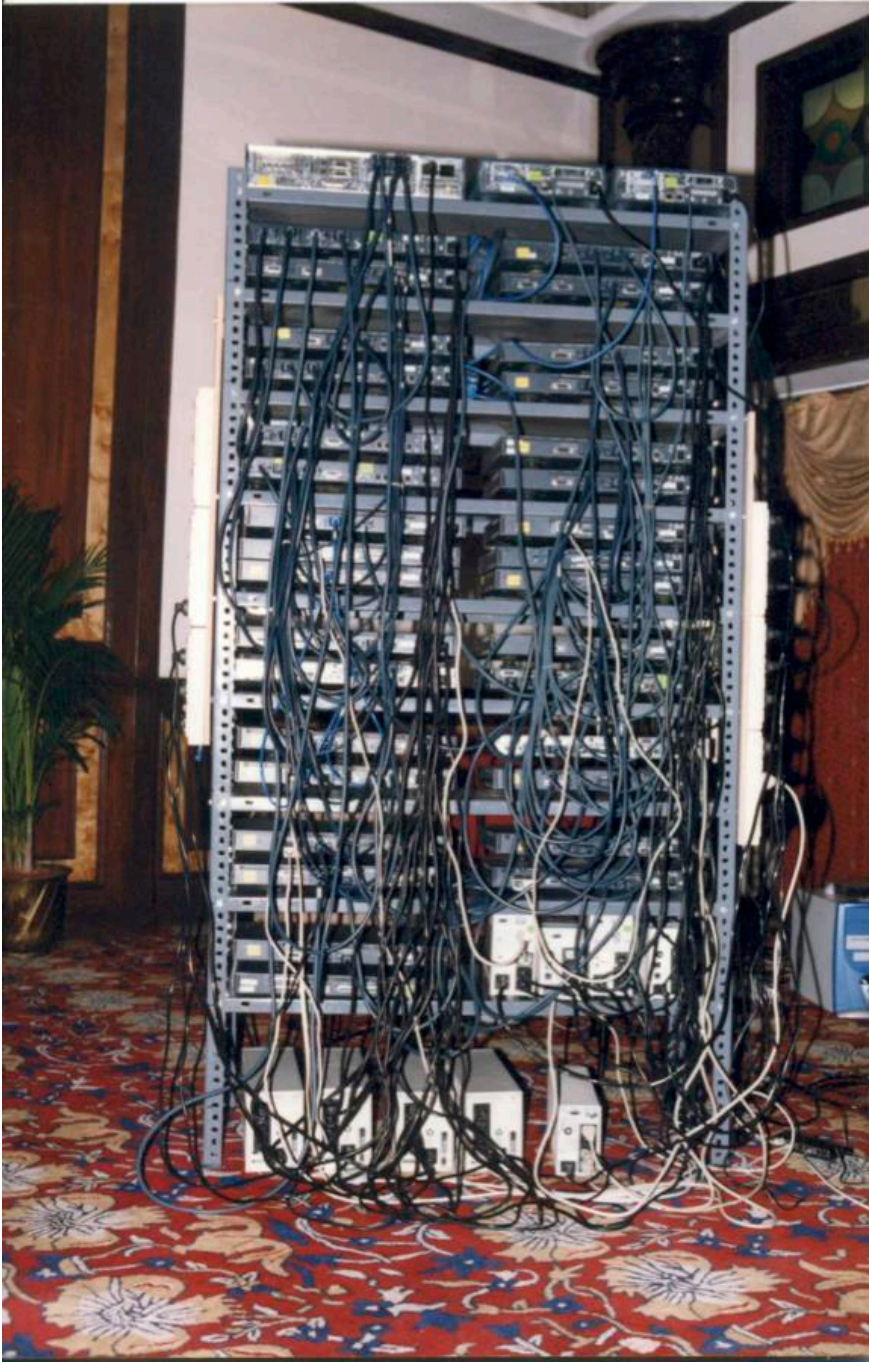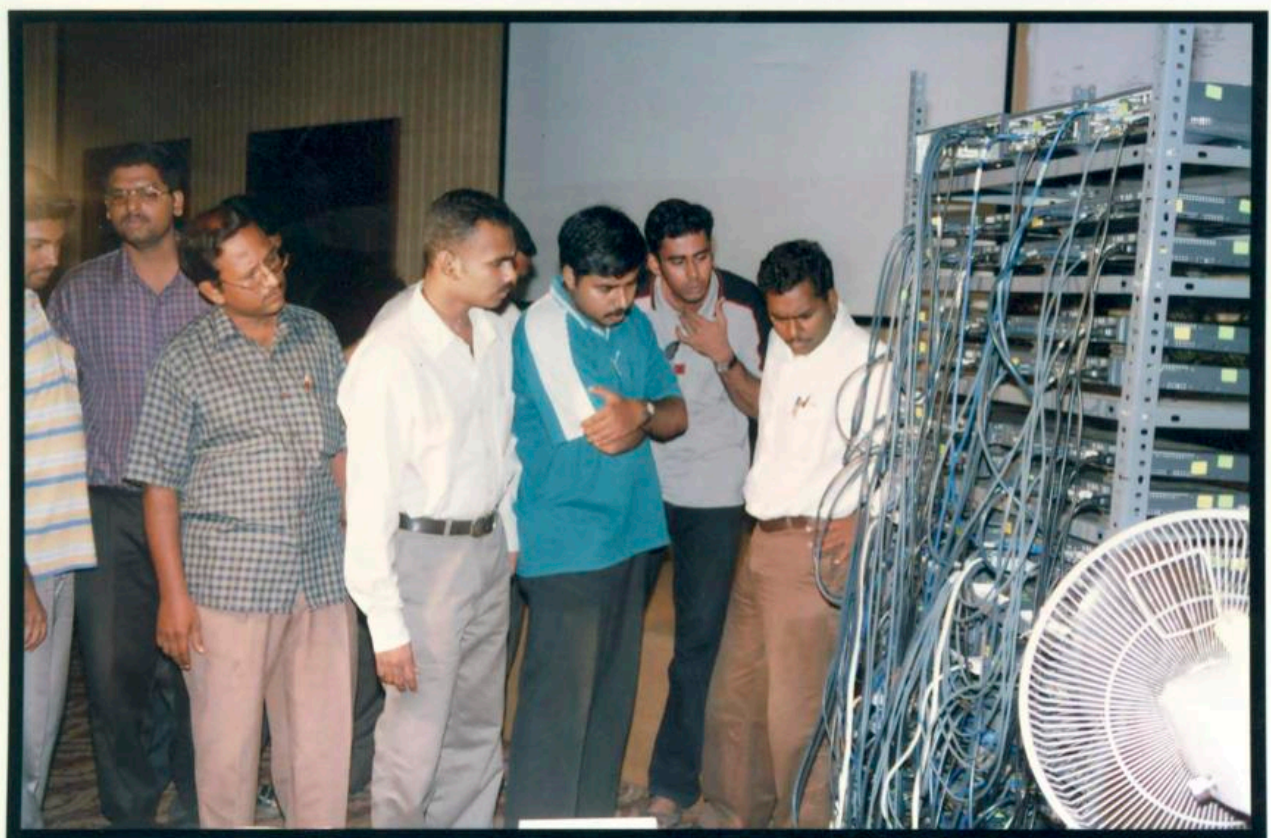
Workshop on Routing Protocols conducted at Chennai

Lab setup with routers on the Venue

Workshop on Name Resolution conducted at Chennai

Workshop on Network security Conducted at Chennai

Routing and Switching Lab

Radia Perlman was invited as chief guest at "International Security Conference" at SRM University, Chennai, where Koti conducted a two-day workshop on Network Security.

He always go back to the old memories whenever he teaches STP protocol, designed by her.

With Radia Perlman and others at SRM University, Chennai