



Network & Infrastructure Audit Service

by

International Technology Services Ltd. (ITS)



Do you know

- The type and number of devices you have, how and where they are connected in your network?
- Naming scheme used in your environment (DNS, IPX, NETBIOS)?
- The IP addressing Protocols used (IP, IPX, MAC etc) in your network?
- The type of traffic going through your network (TCP/IP, HTTP)?
- How much bandwidth the different protocols are consuming in your network?
- If your network is under or over utilized?
- If your network can support your upcoming applications (ERP, Document Management, IP-Telephony, etc.)?



Do you have

- All possible information about the different Devices in your network (firmware/software version, latest patches, etc)?
- Do you actually know “Who” and “What” is connected and WHAT they are doing in your network?
- The details of the type of interfaces, MTU, VLAN ID etc. used by your devices?
- Broadcasts that are unnecessarily spreading in your network and eating away your WAN or LAN bandwidth?
- Confirmation that your ISP is providing you with the service/speed that you are paying for?
- Do you have up to date documentation about your networks configuration and layout?

- **Did you do a check on you structured cabling performance and warranty certifications?**
- **Are your users always complaining that the network is slow and you can't find out why for sure?**
- **Do you have intermittent network problems that are effecting your users but can't pin point what is causing them and why they occur?**
- **Are you trying to justify to your upper management and financial controllers why you need to upgrade parts of your network but don't have the full technical information to justify your request?**

You need our Network & Infrastructure Audit Services to help you



- ✓ To obtain accurate details of your network infrastructure and document the flaws that exist in your network.
- ✓ Perform analysis of your company's network and IT Infrastructure to make recommendations to solve your problems once and for all and avoid ad hoc, temporary fixes.
- ✓ With our service you will be able to provide real results to improve your infrastructure that will lead to more satisfied users and happier management.





How ITS can help YOU

- A Study that will provide IT and Management Staff with an **insight** of their Network Infrastructure and the problems caused by all factors affecting the network. ITS expert engineers will provide you with reports and drawings that will enable you to visualize your entire IT infrastructure.
- Provide you with analysis of the issues within your network and the **impact** of these issues on the network and the IT infrastructure.
- Provide **Recommendation on how to resolve** these issues and improve the Network performance.
- **Our service is platform and brand Independent.** It doesn't matter if you have Brocade, Cisco, Juniper, Nortel, 3Com, HP, IBM, etc.

How ITS provides you with world class service



- ✓ ITS developed this service based on procedures and tools selected after extensive research in the ME and international market.
- ✓ ITS invested heavily in testing tools from Fluke Networks, the leader in Network and Telecom test equipment, as well as on training our experienced engineers.
- ✓ Our investment in test tools for this purpose was in excess of \$300K USD and more than \$50K USD in staff training.
- ✓ Our team will generally spend less than a week at your premises with the Fluke Networks tools to gather all of the required information and around 2 - 3 weeks for the report preparation. With the tools our team uses, our expert team doesn't need to spend weeks or months to get the information we need on your network.

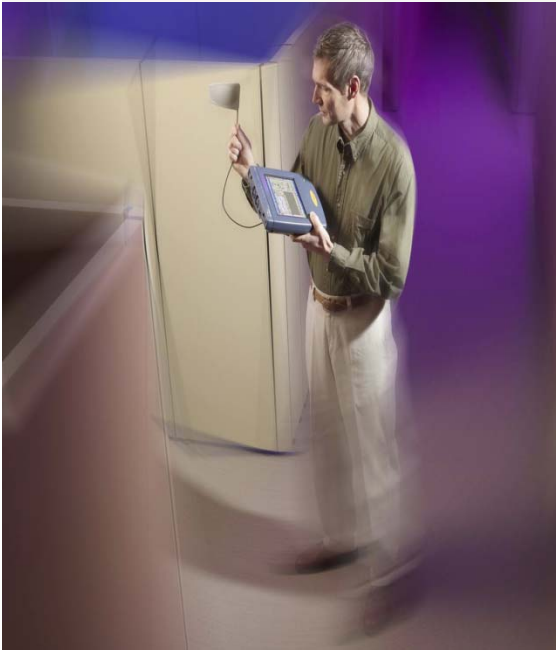
How ITS provides you with world class service



- ✓ The Network Audit Service as offered by ITS is very unique in the Libyan market. **It is a fact that no other company in Libya has the tools, training or certifications the ITS team has, NONE!!**
- ✓ Our service and prices are so competitive that many of our clients who have already used this service are so thrilled with the information they are getting that they are asking us to come back to perform this Network Audit Service on quarterly basis or when they make any changes or update to their IT Infrastructure!!!
- ✓ **ITS will deliver this service to our clients in Libya at discounted prices in this coming year, 2010.**



- Fluke Networks provides innovative solutions for the installation and certification, testing, monitoring and analysis of copper, fiber and wireless networks used by enterprises and telecommunications carriers.
- The company provides network installers, owners, and maintainers with superior vision, combining speed, accuracy and ease of use to optimize network performance.
- Headquartered in Everett, Washington, Fluke Networks has over 700 employees worldwide and distributes its products in more than 50 countries and are used by 96 of the Fortune 100 companies.
- About 80% of the world market in Network and Cabling test equipment is dominated by Fluke Networks.



OptiView™ Network Analyzer

- It's the only integrated enterprise analyzer that combines: network discovery, traffic analysis, infrastructure analysis, advanced packet capture/decode, and WAN, WLAN and VoIP capabilities into one portable tool
- Assess network readiness prior to deploying new network infrastructure or services
- Validate performance of existing applications and technologies
- Ensure network uptime and improve service levels
- Reduce Mean Time To Repair (MTTR)
- Improve utilization of existing network equipment
- Secure network from internal threats
- Improve IT staff efficiency.





MetroScope™



- **Complete SLA testing**
- **Jitter and server response time measurements**
 - *Supports deployment of advanced services including VoIP, IPTV, DNS, and email*
- **In-depth traffic monitoring**
- **Find problems in IP networks**
- **Active discovery and analysis of networks Investigate**
 - *network and customer devices in-depth, without breaking the network link. on the customer or the network side*



Reflection	FAIL	
50.1 m	850 nm	1300 nm
Loss (dB)		
Status:	FAIL	PASS
Value:	0.79	0.48
Limit:	0.75	0.75
Margin:	-0.04	0.27
Reflectance (dB)		
Value:	-48.55	-30.29

◀ Event		
Overall Results	Previous Event	Next Event

DTX Cable Analyzer

- To ensure application success, it is important to test fiber on three criteria:
 - To the standards specified in the system design.
 - To the specifications defined in the installation contract.
 - To meet the needs of future applications and network services.
- We will provide you with **Cat 6 certification** using our Fluke DTX –in full compliance with industry standards and with superior accuracy.
- Using the DTX Cable Analyzer’s single mode and multimode fiber modules, we can perform a Loss/Length test on two fibers at two wavelengths, and determines their pass or fail status.
- The DTX Compact OTDR will be used to perform Extended fiber certification . A single test checks every connector and splice on a link to ensure the fiber cabling meets the defined specifications.



We will provide you with a report that includes



Discovery:

- Show all the devices on a network within the broadcast domain, or beyond if so configured, and will categorize the devices by type: router, switch, server, host, managed hub or managed access points.
- Network inventory and change reports.
- Discovery of rogue networks and devices attached to your network.
- SNMP data gathering for devices health and performance.
- The OptiView analyzer will be able to display traffic levels by port, error counts by port, and graph these statistics over time.

We will provide you with a report that includes



- Show you detailed statistics about the level and composition of traffic on links of interest, like critical network uplinks, internet connections and server farm convergence points.
- Provides useful link statistics that can determine if network is under stress from errors or utilization. These statistics include utilization levels, error counts, protocol/application distribution, hosts by protocol and byte/packet counts for the users of those applications.
- Application traffic analysis can identify what's being used on the network, how much impact it is making and who is generating that application traffic, e.g., VoIP or Oracle traffic levels.
- Identify malicious applications and sources on network like malicious viruses and P2P file sharing.



We will provide you with a report that includes

- **Packet capture and analysis:**

- *Application analysis and troubleshooting within the packets.*
- *VoIP analysis on call-by-call basis with QoS scores.*
- *Provides proof of application and device behavior to vendors and application developers.*

- **Test asymmetric links:**

Testing set of separate throughput test rates for upstream and downstream testing. This lets you test the performance of links based, for example, on DSL technologies.

- **VLAN Q-in-Q Testing** VLAN settings testing, and test priority preservation.



We will provide you with a report that includes

- **Multicast/IPTV Testing** –measure performance of Joined multicast groups.
- **Server Performance Testing** – Validate performance of DHCP, DNS, e-mail, file, WINS, web, and other servers.
- **VoIP Test Option** – Make phone calls, test call managers and measure call quality.
- **Wireless Test Option** – Tests 802.11a/b/g Ethernet. Detects devices and access points, monitors usage and tests performance.
- **UTP and Fiber cable systems testing** Test the UTP or fiber against industry standard in order to have a certified structured cabling system.

How ITS provides you with world class service

ITS provides its customers with professional services with full support from Fluke Networks.

Our Main goal is to provide the customer with study, analysis and recommendations that satisfies the customer needs who is striving for better network performance and a network that would support the upcoming applications with optimum performance.



Questions?





Thank You!

For further information, please contact:

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