

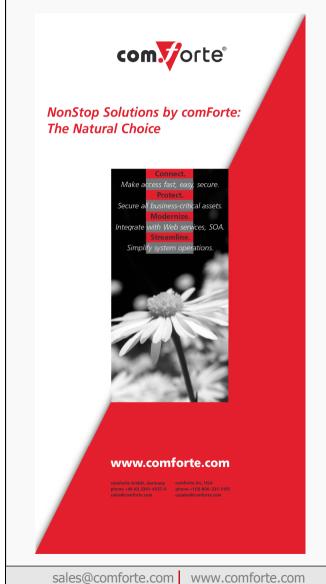


sales@comforte.com www.comforte.com

Boost security while reducing administration time and costs

Andreas Lutz Account Manager EMEA





Agenda

- Protect Your Business
- Solutions Overview
- Product Highlights



Protect Your Business – Secure Your NonStop Systems

Challenges and Drivers

- Organizations around the world entrust their business-critical application with NonStop systems
- Increasingly, organizations come under pressure to prevent and avoid attacks on their systems
- Access to data and applications needs to be secure in order to enable and protect your business.
- Regulatory compliance (PCI, SOX, ...) is an ongoing exercise and is a (sunk) cost to the business
- User productivity needs to be improved by using modern and strategic administration tools.



Solution Overview



- NonStop system console emulation
- → Web to host communication
- Application rejuvenation

STREAMLINING

- **→** NonStop Management tools
- **→** Spooler report distribution
- **→** EMS event informer
- → NetBatch GUI



MODERNIZATION

- **→** SOA integration
- **→** Application modernization
- Web service technology

PROTECTION

- **→** Data encryption in transit
- **→** Data encryption at rest
- User authorization
- User authentication

sales@comforte.com www.comforte.com



comForte Product Highlights

*New * **SecurSSO**

 Integrating Active Directory with HP NonStop for true Single Sign-on

New SecurTN/3270

support of 3270 emulation protocol

SafePoint Alarms

Real-time alerting and monitoring

TOP

 The Operations Pack for NonStop Administration



comForte Product Highlights

*New * **SecurSSO**

 Integrating Active Directory with HP NonStop for true Single Sign-on

New SecurTN/3270

support of 3270 emulation protocol

SafePoint Alarms

Real-time alerting and monitoring

TOP

 The Operations Pack for NonStop Administration



How many passwords do you use?

- How many different passwords?
- → How strong?
 - Length requirements
 - Complexity requirements
 - Change requirements
 - → Tokens ?

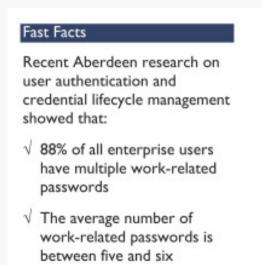


Figure 1: Current Password Practices (all respondents) Username / Passw ord 98% ... w ith length requirements 71% ... w ith complexity requirements ... w ith restrictions on re-use ... w ith non-dictionary requirements ... w ith mandated passw ord changes Username / passw ord and 1 other method Username / passw ord and 2 or more other methods Passw ords Only Non-Passw ords Only non-password method(s) Source: Aberdeen Group, March 2008



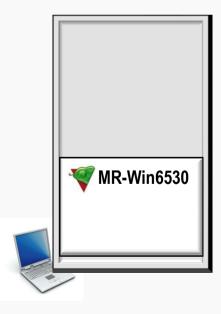
SecurSSO: Installation and Configuration

- Install and configure SecurSSO on the NonStop server.
- Export a Kerberos Host Service Keytab for the NonStop server from Active Directory.
- Configure the Active Directory user on the NonStop
- Install a Kerberos GSS-API compliant emulator on the PC.

AD (Active Directory) **KDC Server**

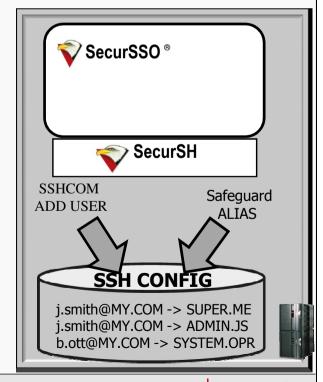






NonStop System:

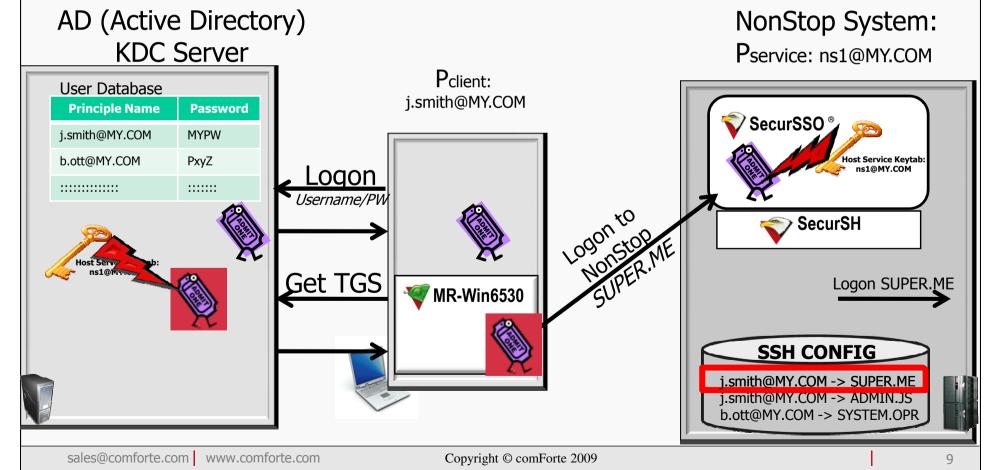
Pservice: ns1@MY.COM





SecurSSO: How it Works for End Users

- 1. User logs onto Windows (as normal) using AD. AD authenticates the user and returns an TGT (Ticket Granting Ticket the Initial Kerberos Ticket).
- 2. Start the SSH client (e.g., MR-Win6530) which requests a TGS (Kerberos Service Ticket) for the NonStop server from the KDC.
- 3. The KDC encrypts a TGS with the host keytab and returns to the client.
- 4. SSH client passes the TGS to SecurSSO on the NonStop. SecurSSO decrypts the TGS (using the host keytab), maps the Principle-Client to the NonStop user name, and Logon to NonStop without being prompted for user name and password





NEW: SecurSSO

- Kerberos implementation
- Integrates NonStop Servers with Microsoft Active Directory, creating a true Single-Sign-On solution
- Enhances security and compliance as Active Directory password policies and access control are enforced for NonStop logons.
- Leverages any strong authentication infrastructure that already exists for Windows, such as Smart Cards or One Time Passwords
- Supports users with multiple Guardian IDs
- Reduces password management burdens on users and support organizations.
- Recorded SecurSSO Webinar at www.comforte.com/secursso



comForte Product Highlights

*New * **SecurSSO**

 Integrating Active Directory with HP NonStop for true Single Sign-on

New SecurTN/3270

support of 3270 emulation protocol

SafePoint Alarms

Real-time alerting and monitoring

TOP

 The Operations Pack for NonStop Administration



NEW: SecurTN/3270

- SecurTN fully replaces TELSERV on the NonStop system and provides SSL encryption for telnet connections to the HP NonStop Systems.
- SecurTN/3270 is extension to SecurTN in order to support 3270 emulation protocol (Optional feature)
- Conveniently connect to 3270 telnet servers
- Ideal for customers who want to replace existing 3270 Telnet Server products



NEW 3270-TCP/IP solution: comForte SecurTN/3270

New player in town for 3270 connectivity over TCP/IP network

What is SecurTN/3270?

- SecurTN/3270 provides high capacity 3270 connections for HP NonStop Pathway over TCPIP protocol
- → Straight replacement for HP TN3270 or ICE TNSERVER

SecurTN/3270 Features

- Dynamically adds Pathway terms
- → SSL encryption
- Supports a broad range of 3270 emulators (e.g., Attachmate, Rumba, MR-Win6530, ...)

SecurTN/3270 product history

- → SecurTN with 6530 support in production for many years
- comForte saw need for 3270 support and dynamic Pathway management
- Available for testing/purchase immediately





SecurTN/3270 Benefits

→ SecurTN/3270 Benefits

- Load balancing of 3270 connections to Pathway terms.
- Conformance with security regulation (e.g., PCI).
- High capacity: supports an extensive network (e.g., >50K sessions)
- Improved audit log capability
- Granular firewall rules which enable restriction based on application access
- Simple configuration with robust operation
- Competitively priced



comForte Product Highlights

*New * **SecurSSO**

 Integrating Active Directory with HP NonStop for true Single Sign-on

New SecurTN/3270

support of 3270 emulation protocol

SafePoint Alarms

Real-time alerting and monitoring

TOP

 The Operations Pack for NonStop Administration



SafePoint Reports

What are SafePoint reports?

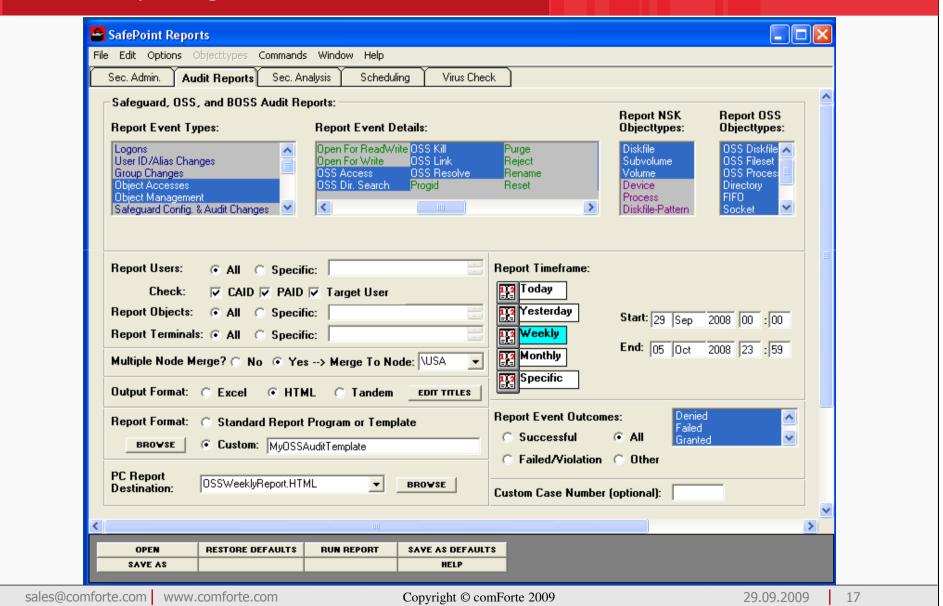
- Easy access to Safeguard, OSS, & BOSS audit reporting.
- Provides clear Safeguard ACL and user reports.

Key Features . . .

- Three interfaces: GUI, TACL, and batch.
- Provides merged audit reports across your entire NonStop network.
- Intelligent reports, not just formatted audit field dumps.
- Satisfies all PCI requirements for HP NonStop audit reporting
- Proven reliable track record (15+ years)



SafePoint Reporting - What's it look like?





SafePoint User Snapshot Report

User Name or Alias	User	C	Owner	Last Logon	Last Mod.	Pswrd. Exp.	User Exp.	Status						Audit			
	ID	н						Т	F	Е	F	Α	Α	M	M	U	
		Α						н	R	X	Α	U	U	Α	Α	Α	
		Ν						Α	0	P	1	Р	F	Р	F	Р	
		G						W	Z	1	L	Α	Α	Α	Α	Α	
		Е						Е	Е	R	Е	S	1	S	1	S	
								D	N	E	D	S	L	S	L	S	
ADB.ED	48,001		SUPER.SUPER	24FEB08, 13:21	24FEB08, 11:53	NONE	NONE	Т			7	Α	Α	Α	Α	N	
ADB.FRANK	48,004		SUPER.SUPER	NONE	24FEB08, 12:29	26MAR04, 00:00	31APR08, 23:59	Т		Р	0	Α	Α	Ν	Ν	Ν	
ADB.JOHN	48,010		SUPER.SUPER	NONE	24FEB08, 12:09	NONE	NONE	Т			0	Ν	Ν	Ν	Ν	Ν	
ADB.JUNK	48,006		*.SUPER.SUPER	10AUG07, 15:08	10AUG07, 14:55	09SEP07, 00:00	NONE	Т		Р	0	N	N	N	Ν	N	
ADB.NANCY	48,003		SUPER.SUPER	NONE	18OCT07, 13:19	NONE	NONE	Т			0	Α	Α	Ν	Ν	Ν	
ADB.NEW	48,007		SUPER.SUPER	NONE	26AUG08, 18:11	NONE	NONE	Т			0	Α	Ν	Α	Ν	Ν	
ADB.TED	48,005		SUPER.SUPER	NONE	18OCT07, 13:19	NONE	NONE	Т			0	Α	Α	Ν	Ν	Ν	
ADB.TOM	48,002		SUPER.SUPER	NONE	18JUL08, 11:42	NONE	31AUG08, 23:59	Т		U	0	Α	Α	Ν	Ν	Ν	
BAKER.QA	157,002		SUPER.SUPER	28JUN08, 16:13	08SEP08, 09:56	NONE	NONE	Т			4	Α	Α	Α	Α	Ν	
DEV.TESTER	152,230		SUPER.SUPER	05FEB08, 14:37	22MAY08, 14:13	NONE	NONE	Т			2	Ν	Ν	Ν	Ν	Ν	
GUEST.DBA	11,001		SUPER.SUPER	22JUN07, 14:00	22JUN07, 13:59	NONE	NONE	Т			3	Ν	Ν	Ν	Ν	Ν	
HILO.JAY	44,001		SUPER.SUPER	12JUN08, 13:19	17JUN08, 14:22	NONE	NONE	Т			0	Ν	Ν	Ν	Ν	Ν	
HILO.MARK	44,002		SUPER.SUPER	NONE	17JUN08, 14:22	NONE	NONE	Т			0	Ν	Ν	Ν	Ν	Ν	
HILO.SPENCE	44,003		SUPER.SUPER	NONE	17JUN08, 14:22	NONE	NONE	Т			0	N	N	N	Ν	Ν	
LAN.TEST004	3,004		SUPER.SUPER	NONE	21OCT08, 10:03	NONE	NONE	Т			0	Ν	Ν	Ν	Ν	Ν	
LAN.TEST1	3,001		SUPER.SUPER	NONE	21OCT08, 10:03	NONE	NONE	Т			0	Ν	Ν	Ν	Ν	Ν	
LAN.TEST2	3,002		SUPER.SUPER	NONE	21OCT08, 10:03	NONE	NONE	Т			0	Ν	Ν	Ν	Ν	Ν	
LAN.TEST3	3,003		SUPER.SUPER	NONE	21OCT08, 10:03	NONE	NONE	Т			0	Ν	Ν	Ν	Ν	Ν	
MSNBC.MANAGER	9,255		SUPER.SUPER	08SEP08, 07:23	08MAY08, 06:24	NONE	NONE	Т			3	Ν	Ν	Ν	Ν	Ν	
MSNBC.MWOODS	9,001		SUPER.SUPER	05SEP08, 11:42	26APR08, 14:22	NONE	NONE	Т			0	Ν	Ν	Ν	Ν	Ν	



SafePoint ACL Snapshot Report

Object	С	Owner	Users			Ac	се	SS				Fi	le			Au	dit	
	H A N G E			D E N Y	R E A D	W R I T E		U R G	R E A	N E	PROG-D	С	CLEAR	PERST	ACPASS	ACFAIL	MAPASS	M A F A I L
Volume Rule																		
(none for \$SYSTEM)																		
Subvolume Rules																		
\$SYSTEM.SAFE		SUPER.SUPER	SUPER.SUPER *.*.*		R R	W	E	Р	С						N	N	N	N
\$SYSTEM.SAFE05		SUPER.SUPER	SP.SPENCE		R	W	Ε	Р	С						Ν	Ν	Ν	N
\$SYSTEM.SAFEPT		SUPER.SUPER	*.SUPER.*		R	W	Ε	Р	С						Α	Α	Α	Α
\$SYSTEM.SPE01		SUPER.SUPER	SP.SPENCE		R	W	Ε	Р	С	0					Α	Α	Α	Ν
			SP.JAY		R	W	Ε	Р										
			SUPER.MIKE SUPER.SUPER		R R	W W	Ε	Р	С									
\$SYSTEM.SPE2		SUPER.SUPER	SP.SPENCE	Deny	R			Р							Α	Α	Α	Ν
			SUPER.SUPER		R	W			С									
\$SYSTEM.SPE3		SUPER.SUPER	SP.SPENCE		R				С						Ν	Ν	Ν	N
			SUPER.SUPER		R	W	Ε	Р	С									
			..*		R													
\$SYSTEM.SPE5		SUPER.SUPER	SP.MIKE		R	W	Е	Р							Α	Α	Α	Α
File Rules																		
\$SYSTEM.SYS00.SCPTCOL		SUPER.SUPER	* *		R	W	Ε	Р	С			X			Α	Α	Α	Α



SafePoint Audit Report

System	Object Name	Date	Time	IP	Action	Operation	Before	After	Object-	Result
, ,				Address	Done By	•	Change	Change		Outcome
\DEV	\$AU204	24SEP08	11:41:20	165.245.210.11	lee_smith	OPEN FOR READ/WRITE			PROCESS	GRANTED
\DEV	\$DATA2.BAKER200.FUP	24SEP08	11:24:22	174.145.94.60	lee_smith	ALTER PROGID	ON	OFF	DISKFILE	GRANTED
\DEV	\$DATA2.BAKER200.FUP	24SEP08	14:15:40	165.245.210.11	lee_smith	ADD ACL ENTRY		DENY SUPER.JAY (RE	DISKFILE	GRANTED
\DEV	\$DATA2.BAKER200.JDATA	24SEP08	12:07:00	174.145.94.60	lee_smith	ALTER ACL ENTRY	ABC.ED (RW)	ABC.ED (RWEP)	DISKFILE	GRANTED
\DEV	\$DATA2.BAKER200.JDATA	24SEP08	12:07:18	174.145.94.60	lee_smith	DELETE ACL ENTRY	*.SUPER.JAY (RWEP)		DISKFILE	GRANTED
\DEV	\$DATA2.BAKER200.JDATA	24SEP08	13:24:24	165.245.210.11	SUPER.JAY	OPEN FOR READ/WRITE			DISKFILE	DENIED
\DEV	\$DATA2.BAKER200.JDATA	24SEP08	14:16:35	165.245.210.11	lee_smith	DELETE ACL ENTRY	ABC.ED (RWEPO)		DISKFILE	GRANTED
\DEV	\$DATA2.BAKER200.JDATA	24SEP08	14:16:54	165.245.210.11	lee_smith	ADD ACL ENTRY		*.SUPER.MARK (RW)	DISKFILE	GRANTED
\DEV	\$DATA2.BAKER200.JDATA	24SEP08	14:17:06	165.245.210.11	lee_smith	ALTER AUD-ACC-FAIL	LOCAL	ALL	DISKFILE	GRANTED
\DEV	\$DATA2.BAKER200.LOG	24SEP08	12:07:57	174.145.94.60	lee_smith	OPEN FOR READ/WRITE			DISKFILE	GRANTED
\DEV	\$DATA2.BAKER204.IPDB01	24SEP08	12:54:29	165.245.210.11	lee_smith	CREATE			DISKFILE	GRANTED
\DEV	\$DATA2.BAKER204.IPDB0	24SEP08	12:54:40	165.245.210.11	lee_smith	PURGE			DISKFILE	GRANTED
\DEV	\$DATA2.BAKER204.IPDB01	24SEP08	12:54:43	165.245.210.11	lee_smith	CREATE			DISKFILE	GRANTED
\DEV	\$DATA2.BAKER204.IPDB01	24SEP08	12:55:13	165.245.210.11	lee_smith	OPEN FOR WRITE			DISKFILE	GRANTED
\DEV	\$DATA2.BAKER204.IPDB01	24SEP08	14:17:46	165.245.210.11	lee_smith	OPEN FOR READ/WRITE			DISKFILE	GRANTED
\DEV	\$DATA2.BAKER204.IPDB0	24SEP08	14:17:58	165.245.210.11	lee_smith	OPEN FOR WRITE			DISKFILE	GRANTED
\DEV	\$DATA2.BAKER204.LOG	24SEP08	12:43:27	165.245.210.11	lee_smith	OPEN FOR READ/WRITE			DISKFILE	GRANTED
\DEV	\$DATA2.BAKER204.LOG	24SEP08	12:43:47	165.245.210.11	lee_smith	OPEN FOR READ/WRITE			DISKFILE	GRANTED
\DEV	\$DATA2.BAKER204.SFUP	24SEP08	12:43:25		lee_smith	ALTER LICENSE	OFF	ON	DISKFILE	GRANTED



NEW: SafePoint Alarms

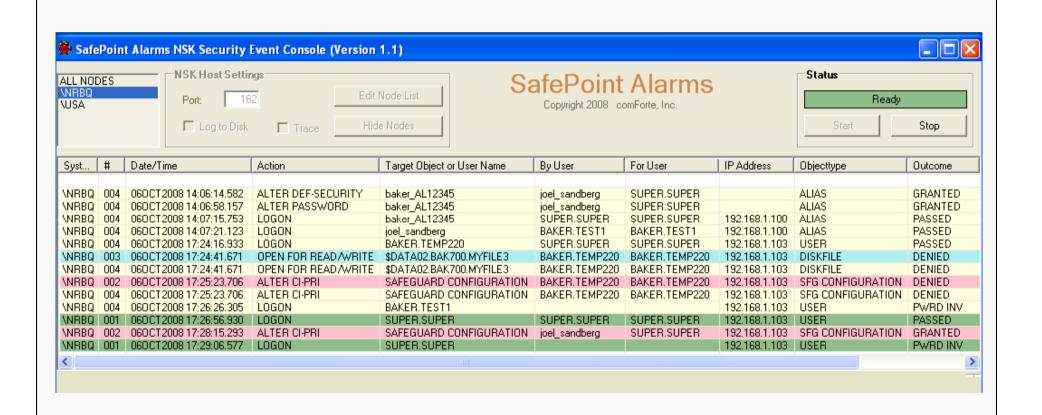
- SafePoint Alarms provides
 - Real-time HP NonStop security alerts
 - User-defined rules
 - Custom-configured alarm criteria
- What are the features?
 - Real time security alerting conditions defined by flexible rules.
 - Variety of alarm options (EMS, SNMP, SQL/MP, etc.).
 - Monitor alarms with either industry standard console (e.g., HP OpenView, CA Unicenter, Tivoli, etc.) or provided SafePoint Alarms Console.
- Satisfies PCI and other Data Security monitoring requirements.
 - Centralized event collection
 - Intrusion detection
 - File integrity monitoring
 - Enforce security policy



SafePoint Alarms – An Overview GUARDIAN (SCF, FUP, ...) oss Track Users Logical User Creation Node Access Users Logon logoff File access **Audit Client** ACL BOSS Safeguard Safeguard **BOSS Log** Audit Log SafePoint Alarms Rules & Analysis **Console or SNMP** SafePoint **Mgmt Console** (e.g., HP Alarms OpenView, TIVOLI, ...) **SNMP** Traps SQL/MP **EMS** Alarm Flat Files **EMS** Log SQL Tables Alarm Log **Files** 22 sales@comforte.com www.comforte.com Copyright © comForte 2009



SafePoint Alarms Console – What does it look like?





SafePoint Alarms – Benefits

Benefits . . .

- Satisfies PCI and other Data Security monitoring requirements.
 - Centralized event collection
 - Intrusion detection
 - File integrity monitoring
 - Enforce security policy



comForte Product Highlights

*New * **SecurSSO**

 Integrating Active Directory with HP NonStop for true Single Sign-on

New SecurTN/3270

support of 3270 emulation protocol

SafePoint Alarms

Real-time alerting and monitoring

TOP

 The Operations Pack for NonStop Administration

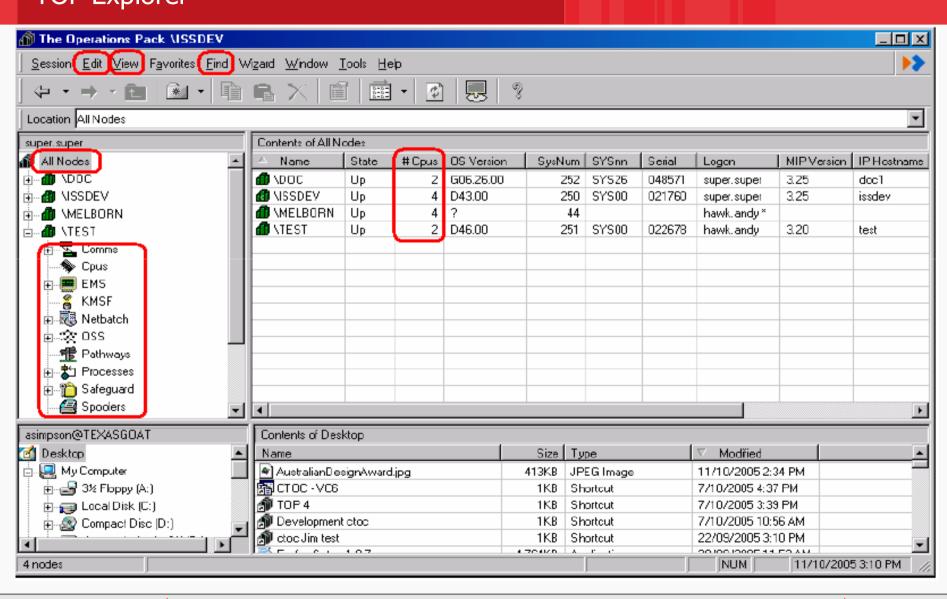


TOP – The operation Pack for NonStop

- Strategic front-end for command and control access to NonStop servers from Windows workstations:
 - **TOP Explorer** for managing nodes and system components
 - **TOP Spool** is a comprehensive spooler monitoring tool for NonStop server printers
 - **TOP User ID** to monitor and manage NonStop user ID's, Aliases, and Groups
 - **TOP Path** is a powerful GUI for Pathway configuration, management & operation
 - **TOP Comms** a comprehensive communications manager for NonStop
 - **TOP SDK** Software Toolkit to build workstation-based NonStop server applications



TOP Explorer

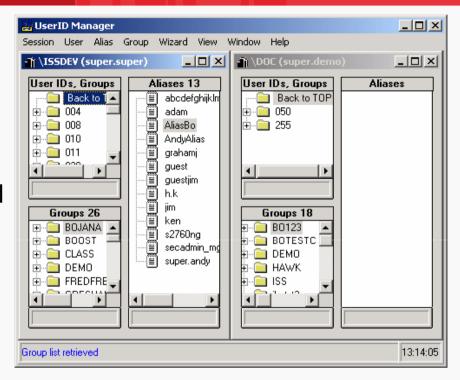




TOP User ID

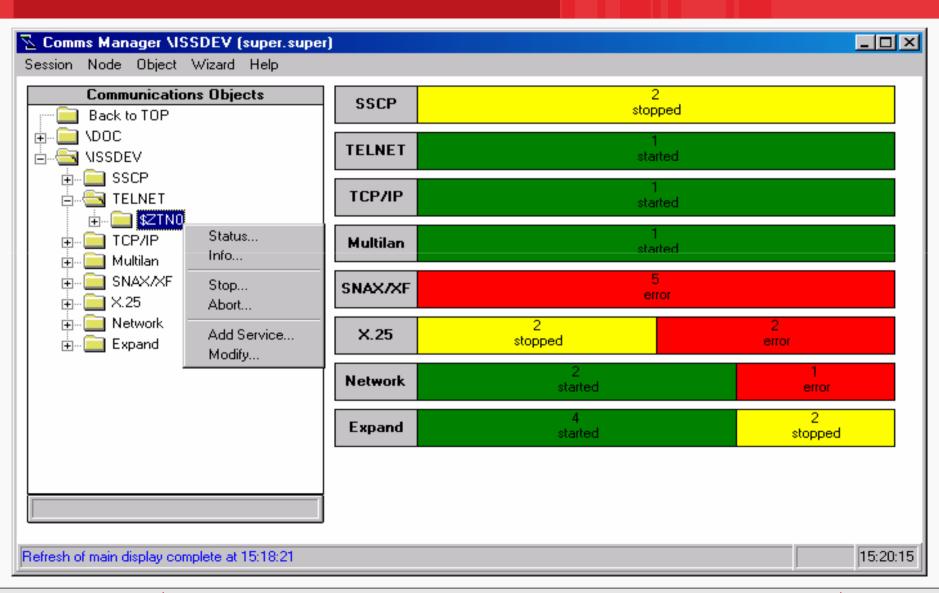
TOP UserID provides a graphical layer that preserves your existing Safeguard or Guardian security investment and enables you to perform user management tasks on any node to which you are logged on. TOP UserID features include:

- Control of user ID, alias and group records.
- Adding single or multiple user ID records, aliases, and groups.
- Copying, modifying, and deleting user ID records, aliases, and groups.
- ❖ Wizards to perform tedious user administration tasks easily, such as reassigning files belonging to deleted users.



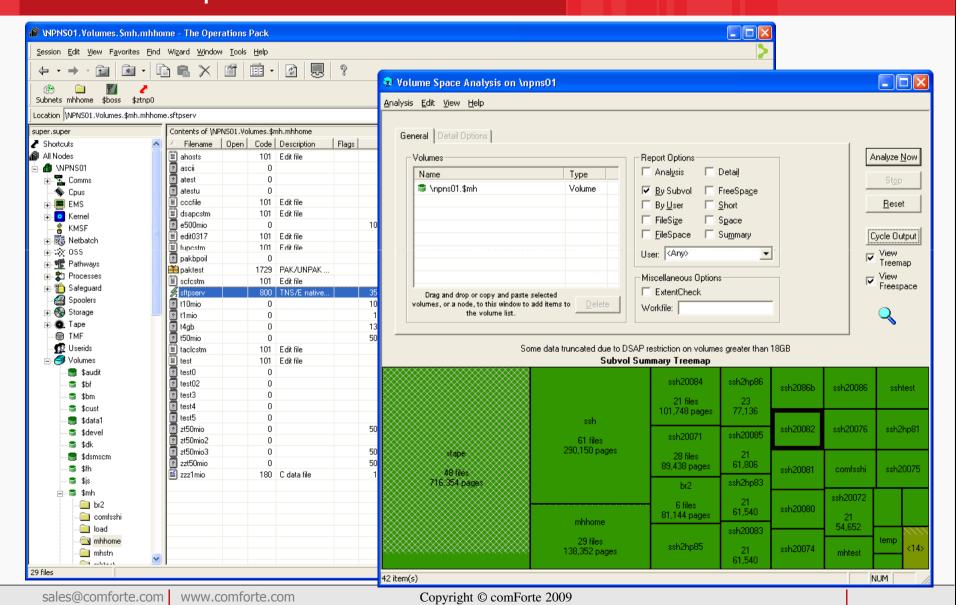


TOP Comms





TOP: The Operations Pack









sales@comforte.com www.comforte.com

Q&A

Contact Information:

A.Lutz@COMFORTE.COM WWW.COMFORTE.COM