



## TANDBERG Video Communication Server Control

The TANDBERG Video Communication Server (VCS) Control Application provides SIP proxy and call control as well as H.323 gatekeeper services. VCS is the center of the intelligent video communication network, connecting all infrastructure, management and endpoint devices and is key to interoperability with Unified Communications and IP Telephony networks and VoIP devices.



#### DESIGN FEATURES

- Designed to work with any standards based H.323 or SIP device
- Appliance-based architecture enables easy deployment and high reliability
- Full multi-vendor support
- Secure and reliable
- 1U rack mountable

#### APPLICATION FEATURES

- Flexible zone configuration with named zones and default zone
- Supports inter- and intrazone bandwidth control
- Provides IPv4/v6 Translation Services
- Policy Engine for processing calls
- URI and ENUM dialing
- Device authentication using H.235 and SIP digest authentication
- Embedded setup wizard for easy installation
- SIP Presence Server and User Agent
- TANDBERG FindMe™
- Multiway™

#### PERFORMANCE FEATURES

- Supports up to 2,500 registered devices and 100 concurrent traversal calls
- Up to 1000 neighboring zones (traversal zones included)
- HTTPS, SSH and SCP for secure management
- Uses compact flash for critical storage and a hard drive for other functions
- Supports clustering of up to six VCS increasing capacity and redundancy

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#### TANDBERG VCS CAPACITY

Up to 2,500 registrations  
Up to 500 non-traversal calls  
Up to 100 traversal calls  
Up to 1000 neighbor zones  
Up to 1000 sub-zones

#### TANDBERG VCS CONTROL APPLICATION FEATURES

H.323 gatekeeper  
SIP Proxy/Registrar

#### TANDBERG VCS EXPRESSWAY™ APPLICATION FEATURES

NAT Traversal functionality enabling secure traversal of any NAT firewall  
Registration of traversal-enabled endpoints  
Standards based TURN Server and supports firewall traversal for ICE enabled devices

#### TANDBERG VCS MAIN FEATURES (CONTROL AND EXPRESSWAY™ APPLICATIONS)

SIP and H.323 support, including SIP/H.323 gateway for locally registered endpoints  
IPv4 and IPv6 support, including IPv4/IPv6 Interworking  
SIP and H.323 interworking for non-registered endpoints  
Bandwidth management on both a per-call and a total usage basis, configurable separately for calls within the local sub-zones and to neighboring systems and zones  
URI and ENUM dialing via DNS, enabling global connectivity  
Automatic downspeeding option for calls that exceed the available bandwidth  
Flexible zone configuration with prefix, suffix and regular expression support  
Can function as a standalone VCS or be neighbored with other systems such as VCS, Border Controllers, Gatekeepers and SIP proxies  
Can be clustered with up to 6 other VCS peers for capacity and redundancy purposes  
Name clusters for ease of management and deployment  
Optional endpoint authentication  
Control over which endpoints are allowed to register  
Administrator Policy including support for CPL  
Embedded setup wizard via a serial port for initial configuration  
System administration via a web interface or RS-232, Telnet, SSH and HTTPS  
Static NAT Support\* (requires Dual Network Interface Option)

#### OPTIONAL FEATURES

TANDBERG FindMe™ (User Policy)  
– Supports enterprise authentication  
– Efficient large scale provisioning of user FindMe accounts utilizing LDAP  
SIP/H.323 interworking for non-registered endpoints  
Dual Network Interface  
Multiway™  
TMS Agent

#### ARCHITECTURE

Secure appliance-based architecture  
Flash memory and hard drive  
ITU-T H.323 v6 compliant  
ITU-T H.225 v6 compliant  
TANDBERG Expressway Technology  
H.460.18/.19 compliant  
H.460.18 client proxy support  
Supports H.460.19 multiplexed media

#### RELIABILITY

Registrations survive system restart  
Fast start-up time  
Configuration Replication for Clusters  
Expressway process recycling within seconds  
H.225 Alternate Gatekeeper Support

#### SUPPORTED RFCS

RFC 2543, RFC 3261, RFC 3264, RFC 1889, RFC 3265, RFC 3325, RFC 3515, RFC 3891, RFC 3892, RFC 2327, RFC4566

#### SECURITY

Secure Management with HTTPS, SSH and SCP  
– Secure File Transfer  
– Inactivity Timeout  
Can lock-down IP services  
Authentication required on HTTP(S), Telnet, SSH, SCP and serial port  
Compatible with H.235 v2 and v3 enabled H.323 devices  
H.235 Authentication support  
TLS for SIP signaling  
Roles based password protected GUI user access  
Ability to enforce strict passwords  
Ability to disable root access over Telnet of SSH

#### MANAGEMENT

Supports industry standards such as RS-232, Telnet, HTTP(S), XML, SNMP, SCP and SSH  
Embedded setup wizard on serial port for initial configuration  
Advanced management support and configuration with TANDBERG Management Suite 12.0 or newer  
Call logging and diagnostics  
Support for logging to a syslog server  
Local time zone aware  
Port usage tool

#### CALL CONTROL AND REGISTRATIONS

Supports manual registration of H.323 and SIP endpoints and API call control  
Supports H.225/Q.931, H.245 call control routed mode and non call routed mode  
Supports H.323-SIP Interworking Encryption  
Supports H.323-SIP Interworking DuoVideo  
Registration of H.323 ID, E.164 aliases and services  
Supports Unicode (UTF-8) registration for global implementation  
Disconnect H.323 calls from the API interface  
URI Dialing  
Up to 100 traversal calls  
Up to 100 services for a single device  
Up to 2500 registered Expressway Devices  
Direct call signaling between neighbored VCSs, border controllers and gatekeepers  
Call Policy Management (RFC 3880) including Call Policy and User Policy (FindMe)  
Conference hunting for MCU cluster support  
Call Routed Mode  
Call Loop Detection Mode

#### ZONE CONTROL

Supports Remote Zone monitoring  
Supports Remote Zone redundancy  
Supports up to 200 neighbor zones (including VCSs, Border Controllers, gatekeepers and SIP proxies)  
Supports sub-zone area definition for bandwidth management  
Flexible zone configuration with named zones and default zone  
Supports forwarding of requests to neighbor zones (including VCSs, border controllers, gatekeepers and SIP proxies)  
Registration Control (open, specifically allow, specifically deny)  
Cisco Unified Communication Manager zone profile available for efficient interoperability configuration

#### BANDWIDTH MANAGEMENT

Interzone — definable call-by-call  
– Max bandwidth per call  
– Max aggregate bandwidth for all neighboring zones  
Intrazone — definable call-by-call  
– Max bandwidth per call  
– Max aggregate bandwidth  
Auto-downspeeding if call exceeds per-call maximum  
Gateway load balancing  
Automatic network failover  
Provides capacity warnings for users and administrators

#### INTERFACES

4x 10/100/1000 Base-TX Ethernet ports (RJ-45) (front)  
1x RS232 console port (RJ-45)2 (front)

#### POWER

Auto-sensing 250W (Max) 580 BTU/hr power supply  
90–264V AC full range @ 47–63Hz

#### COOLING SYSTEM

Six 40 mm fans for system cooling

#### SYSTEM CONTROL AND INDICATIONS

1x Power LED  
1x Alarm LED  
1x Power on/off switch (rear)  
4x Act/Link/10/100/1000 LEDs on Ethernet Ports

#### NETWORK

Supports DNS Addressing  
Supports IPv4 and IPv6 simultaneously  
Provides IPv4/IPv6 Translation Services

#### APPROVALS

Directive 73/23/EEC (Low Voltage Directive)  
– Standard EN 60950  
Directive 89/336/EEC (EMC Directive)  
– Standard EN 55022, Class A  
– Standard EN 55024  
– Standard EN 61000-3-2/-3-3  
Approved according to UL 60950 and CAN/CSA C22.2 No. 60950  
Complies with FCC15B Class A

#### DIMENSIONS

426(W) x 457.2(D) x 43.5(H) mm (16.8" x 9" x 1.72")  
1U rack-mount chassis

#### ENVIRONMENT

Operating temperatures: 0° C to 40° C (32° F to 104° F)  
Storage temperatures: -20° C to 80° C (-4° F to 140° F)  
Relative humidity: 10% to 90% (Non-condensing)

#### CERTIFICATION

LVD 73/23/EC  
EMC 89/366/ECC



VCS Version X1 is ICSA Labs Certified

#### AWARDS



All specifications subject to change without notice, system specifics may vary.

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#### TANDBERG

## Video Communication Server Control

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