



Helix™ Server

The most powerful multi-platform software for streaming media

Helix Server is the only multi-format, cross-platform streaming server for delivering the highest quality experience to PCs and mobile devices. Broadcast the most popular media types to PCs and other supported devices from one server infrastructure. You can also deliver 3GPP (H.263 and H.264)* content to a wide variety of multimedia-enabled mobile phones. Helix Server is available for Linux, Windows and Solaris operating systems. Use your platform of choice or leverage your existing heterogeneous operating system environment.

Whether for distance learning, CEO announcements, earnings calls, sermons, campaign speeches or public interest broadcasts, with Helix Server you will be able to reach your audience wherever, whenever is most convenient.

Helix Server

With three capacity versions available (25 stream, 100 stream and Unlimited), Helix Server is a full-featured streaming media server designed for single installments as well as large distributed deployments.

As digital media becomes more pervasive and strategic at your organization, you will want to take advantage of the advanced features associated with deploying multiple Helix Servers. Helix Server is the right solution for corporations, government organizations, educational institutions and non-profit organizations that want to:

- Reach a large audience without being restrained by the streaming capacity of a single server
- Deliver streaming media to both PCs and wireless devices*
- Build out a distributed digital media infrastructure
- Deliver streaming media via multicast** or unicast

Key Decision Criteria for Identifying the Right Server

- How big is your audience - small, medium or large?
- What devices do you plan to support today and in the future - PCs and/or standards-based mobile phones?
- Do you plan to build out a distributed network of servers where content is delivered from a central server to end-users via a network of servers?
- What does your network topology look like? How many tiers are there?
- Are you looking to deliver content to an internal audience via multicast?

Why Deploy Multiple Helix Servers?

- **Conserve Bandwidth**
Multi-location organizations typically deploy a distributed network of Helix Servers to minimize the impact of digital media on their network.

When you deploy multiple servers you are able to distribute digital media to the point where it will be consumed. An employee in a different country, for example, can access a 750kbps media file from a local server rather than using scarce resources on the WAN to access it from a central location.

*Requires Helix Mobile Extension, which is available at no charge to Enterprise, Education and Government customers only.
**Only available with Helix Server Unlimited.

In addition, with the Helix Server, you will be able to take advantage of the bandwidth savings associated with multicasting** your live broadcast. With multicasting you can increase the audience for a live event by reducing the broadcasting bandwidth. This is because Helix Servers send a single live stream to multiple players. Multicasting requires a specially configured network, and is more suited for intranets than Internet delivery.

- **Deliver the Highest Quality Experience**
Improve user experience and broadcast predictability with server fail-over which automatically routes client requests to back-up servers in the event of service failures or unplanned outages.
- **Scale to Reach the Largest Possible Audience at the Lowest Cost**
Improve scalability and reduce bandwidth costs with an integrated server-to-server content networking system specifically designed to provision live and on-demand content reliably across distributed networks.
- **Mission-Critical Reliability**
From encoder to server, from server to server or from server to player, the system can be configured redundantly to provide a fail-over feed in the event of a network or equipment outage.

New in Version 12

- **Fast Channel Switching**
Fast Channel Switching allows quick changes to the media input for a continuous stream, eliminating the need to set up a separate RTSP session for each stream. This brings a more “TV-like” viewing experience to users as they “change channels” between different pieces of video content.

Fast Channel Switching works with on-demand clips, live streams, and simulated-live streams broadcast by SLTA. It is also compatible with security features such as username and password authentication.

This switching capability eliminates the need to set up and tear down a user’s RTSP session when the user selects a new stream. As a result, a user can “change channels” without experiencing disruption in playback when a new channel begins.
- **Enhanced Rate Control**
The new Helix Server v12 also includes rate adaptation improvements for on-demand content, which improve overall end-user QoS, particularly with fluctuating networks.

This Enhanced Rate Control feature automatically delivers the highest bit-rate stream that can be supported by the network at any given time. It seamlessly manages signal strength and bearer handover for maximum end-user QoS and QoE.
- **Multi-Core and 64-Bit Scalability**
For ultimate scalability Helix Server v12 now takes advantage of the latest 64-bit server architecture across Windows, Linux and Solaris operating systems. In this way, Helix continues to provide the most platform choices of any digital media server available.

Helix Server v12 has been optimized for multi-core, 64-bit architectures and has been tested for maximum efficiency on multi-core servers, thus providing superior stability and performance.
- **Native Solaris 10 Support**
Now with native support for the Solaris 10 Operating System, Helix Server v12 takes full advantage of the improved performance and great cost-efficiency of this industry-leading UNIX platform.

Solaris 10 integrates new technologies to deliver high levels of performance, availability and security. Helix Server v12 has been developed natively to run with the highest levels of performance on Solaris 10.

Helix Server v12 running on Solaris 10 is a good choice for customers seeking cross-platform support, simplified administration and high levels of service.





- **More Platforms, Protocols and Formats**

Helix Server supports more platforms than any other major media-streaming server including Linux RHEL 4.0, Solaris 10 (Native) and Windows 2003 operating systems.

Helix Server supports the leading internet protocols, standards, networks and devices including IPv6, RTSP via HTTP v1.1, SNMP v3 and beyond.

Helix Server is the only digital media server with universal support for live and on-demand delivery of multiple file formats, including RealAudio and RealVideo, Windows Media, QuickTime, MP3, AAC and AAC+.

With Helix Server, you can consolidate multiple media infrastructures onto a single platform to simplify media management and optimize the viewer experience.

- **Next Generation Networking Support**

Helix Server supports next generation protocols such as IP v6 for greater reach. This assures interoperability with next generation IP v6 network environments and supports a heterogeneous IPv4/IPv6 environment.

Contact Real Today

To learn more about Helix Servers, please contact a Real sales representative at **1-800-444-8011** or visit www.realnetworks.com/products/media_delivery.html