

## Level 3<sup>®</sup> Streaming Service

Online media distribution is booming. Sports broadcasters, movie studios, television networks, user-generated content sites, and others are delivering more video over the Internet. Users have access to higher broadband connections and demand online video delivered smoothly and quickly. The challenge: streaming media requires the connection between content sources and the consumer to be flawless.

The Level 3 Streaming platform is uniquely positioned to support rich-media delivery. Long regarded as one of the CDN industry's leading streaming platform, Level 3 continues this tradition through enhancements of not only the platform's network breadth and depth, but also its core capabilities. Powered by one of the best connected network backbones in the world, the Level 3 Streaming platform stands ready to support the ever increasing demands of higher-bit-rate stream delivery.

### High Definition Streaming

Designed to support the next generation of High Definition streaming, this platform supports the leading HD media formats – Adobe<sup>®</sup> Flash<sup>®</sup> Video, Windows Media<sup>®</sup>, and Move Player<sup>®</sup> technologies. For delivery of HD content over the Internet, there's no better choice than Level 3. By combining Level 3's CDN and Level 3<sup>®</sup> Vyvx<sup>®</sup> broadcast backhaul services with our Broadcast Encoding Centers, Level 3 can be your single-source transport provider from content creation to end-user consumption. Level 3 is the only option for a true simulcast SD or HD broadcast (though Vyvx broadcast backhaul services) and the only provider to allow broadcasters and sports leagues to take a signal directly from the camera and deliver it in HD over the Internet to mass audiences.

### Streaming Delivery Offerings

Customers can consume our Streaming services through a variety of different options:

- **Live Event:** Streaming for a single live event with true HD options and event management service
- **Live Event Series:** Streaming for a series of live events with multiple days or sessions, with true HD options and event-management service
- **Always Live:** Continuous streaming of an ongoing broadcast
- **On-Demand:** Prerecorded content, streamed and available online anytime

## FEATURES

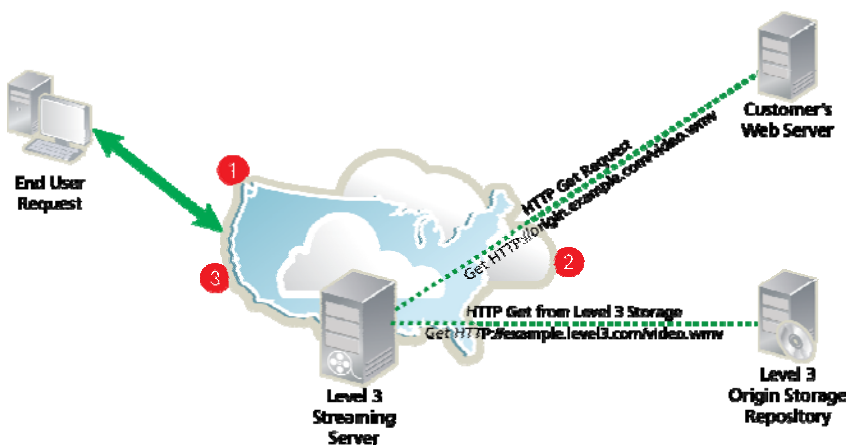
The CDN streaming service can be augmented to provide additional functionality:

- **Security and Control:** Token-based authentication and content management tools
- **Targeted Delivery:** Delivery based on country, metro, and/or network level heuristics of the end user
- **Storage:** Geographically mirrored storage repository offers improved performance and file availability
- **Signal Acquisition and Encoding:** Leverage Level 3's Broadcast Encoding Centers to acquire, encode and transmit your live event
- **Media Management:** Package your content to better monetize your streaming media assets

## BENEFITS

- **Scalability:** Effortlessly handle HD content, flash crowds and peak loads
- **Performance:** Improve download speeds and quality as your content is instantly available at the edge of the Internet
- **Reliability:** No single point of failure, backed by a 100% uptime SLA
- **Savings:** Provide streaming services without having to deploy dedicated infrastructure and licensing

## How On-Demand Streaming Works



**Step 1:** The end user requests an On-Demand streaming asset. End users are directed to the closest edge region on the Level 3 Network via a customer-specific hostname.

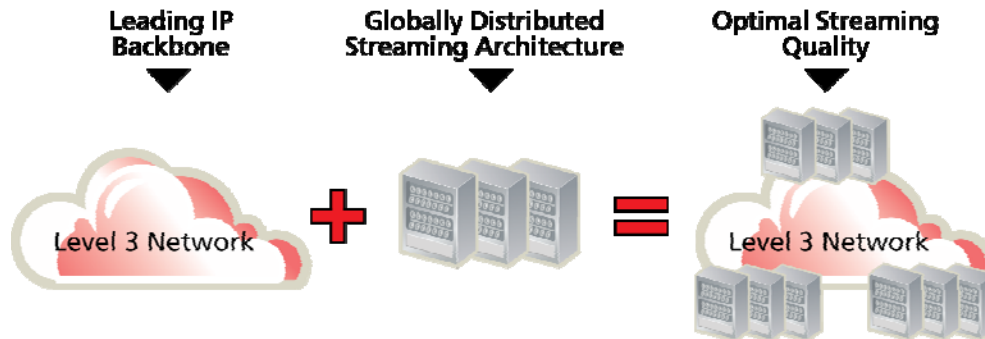
**Step 2:** The edge server determines if it has the content; if it does, it will immediately stream the content. In the event the Level 3 edge server does not have the asset requested, the server will fetch the content from either the customer's web server or the Level 3<sup>®</sup> Origin Storage repository and populate the edge cache.

**Step 3:** The Level 3 edge server streams the content.

## The Level 3 Advantage

Level 3's CDN services are built for video delivery. We have an advanced architecture that:

- Operates on the Level 3 Internet backbone – one of the world's largest IP networks
- Strategically places CDN nodes to reduce hops to any IP address in the world
- Connects directly to 75 percent of U.S. broadband users
- Runs on patented, foundational technology to provide the shortest, best route to content requestors
- Scalable capacity across the entire Level 3 CDN portfolio; optimized for delivery of large video files
- Supports acquisition, encoding and transmission of live events from a single CDN supplier



## Why Level 3?

Level 3 is a Microsoft® Silverlight® Premier Partner, and connects you with Adobe Flash technology. Level 3 is more than a proven carrier; we are a technology company focused on providing you with the best path to connect your content to your customers. Level 3 has a broad service portfolio, coupled with extensive network reach. Additionally, we have strong network performance and invest in unprecedented network scale. This unique combination of assets, engineering innovation, and portfolio allows Level 3 to be a cost-effective solution for you.

Level 3 is the provider of choice to many of the world's most sophisticated communications customers.

- Major television networks
- Top advertising agencies
- 8 of the top 10 most visited websites
- 5 of the top 6 movie studios
- Many of the biggest social networking sites

For more information, contact us at: 1.877.2LEVEL3, email us at: [info@level3.com](mailto:info@level3.com), or visit: [www.level3.com](http://www.level3.com).