



# The Power of Ethernet

See the benefits Ethernet offers your organization

**Frontier**  
BUSINESS EDGE™

# What you will get from this eBook

1. Learn why you need to consider Ethernet
2. See the benefits your organization could derive from Ethernet
3. Find out how regional organizations are benefiting from Ethernet
4. Next steps

# Why you need to consider Ethernet

Many of your peers are using Ethernet to **reduce costs**, **simplify the management of communications** and **provide flexibility** to cope with changes in their business.

If you have not recently updated your communications technology, your business may not be getting what it needs from your network. Older technology, like traditional private line circuits, Frame Relay or ATM, struggles to deliver the services that businesses are rapidly adopting, such as streaming video, VoIP and real-time applications. Having your business fall behind because of dated technology puts you at a competitive disadvantage.

**Now is a great time to take stock of your existing network and see how Ethernet can bring new benefits to your organization.**

# The benefits your organization may derive from Ethernet



## COST REDUCTION

While costs are often a barrier to moving to new technology, **Ethernet might actually save your business money.**

Reasons you might save:

- Ethernet has a **lower cost-per-MB** than traditional solutions, and you'll only pay for what you need
- With Ethernet, your business may also save on capital investments, now and in the future. A single Ethernet network can carry **all your voice and data traffic**, eliminating the time and cost of managing separate networks

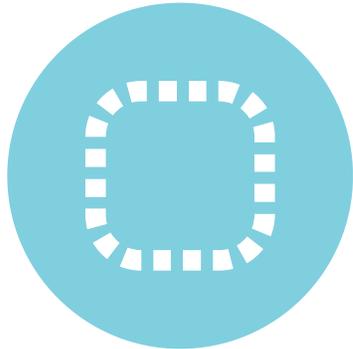
# The benefits your organization may derive from Ethernet



## SIMPLIFYING MANAGEMENT

Ethernet helps you **reduce the complexity of your network**, so managing and updating technology is streamlined. With an Ethernet solution, your staff can more easily make adds, changes and deletes. Remote troubleshooting can help them repair issues without time-consuming onsite visits. As your business grows, Ethernet can be easily scaled without expensive equipment upgrades.

# The benefits your organization may derive from Ethernet



## PROVIDING FLEXIBILITY

Whether it's meeting needs for greater bandwidth, opening a new location or adding new services,

**Ethernet can support the changing demands of your business.**

- Ethernet gives you **the power to grow**—you can easily scale up to precisely the bandwidth you need without an unpredictable price jump
- When you are ready to use cost-saving applications such as VoIP and video conferencing, Ethernet can give or offers you **the capacity you require** to have crystal-clear connections
- Ethernet also helps you **prepare for potential disasters**—be them natural or hacker related—by giving you the power of hosting cloud applications on your network that employees can easily access from home



# How regional organizations are benefiting from Ethernet



# TAILOR CONNECTIONS

**Efficiently use your resources** across your Enterprise by providing the right connectivity to each of your business locations. For example, you could use a high bandwidth connection at your larger headquarters location, while using smaller, more economical connections to branches.

This ability to **tailor Ethernet connectivity requirements to each location**, while also being able to **easily scale the bandwidth up or down in the future**, as business needs change, helps many banks and multisite organizations deploy a **flexible network that is highly cost-effective**.

HQ  
in Chicago



BRANCH  
in Los Angeles



BRANCH  
in Tampa

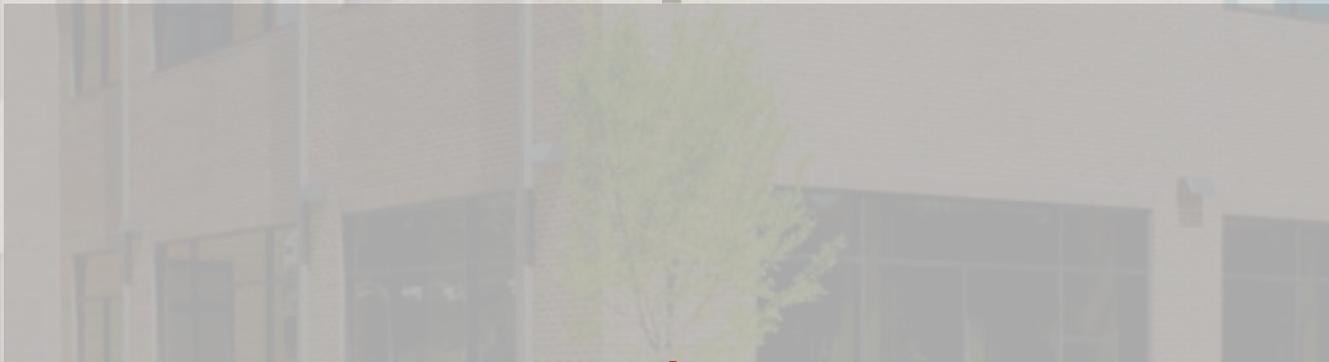
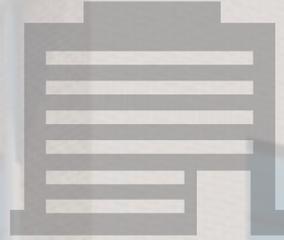


# EASILY ADD/REMOVE LOCATIONS

Easily add or remove locations without the complex, cumbersome network changes that are often required. Another common business issue for multisite organizations is managing the number of locations you operate. As you open new branches, consolidate existing facilities, acquire other companies outside of your primary locations, you need to install, remove or change network connections.

With Ethernet, these **changes can be made without significantly disrupting the business**, without making complex network configuration changes and **without spending large capital investments in new equipment**. Thus, Ethernet technology enables your business to run with greater agility, compared to more rigid legacy networking like ATM and Frame Relay.

HQ  
in Chicago



BRANCH  
in Los Angeles



NEW BRANCH  
in Seattle



BRANCH  
in Dallas



# FAST DATA PROCESSING

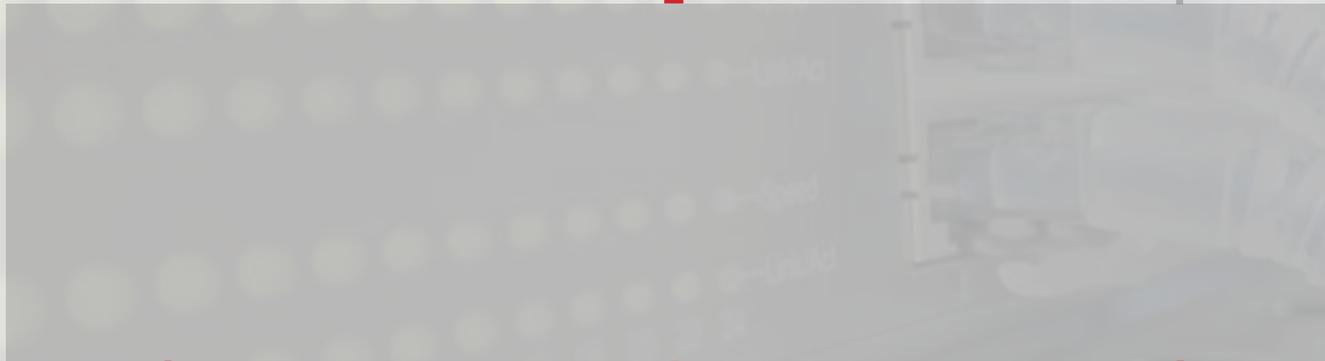
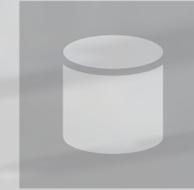
Fast processing of data is critical to every organization. Ethernet is capable of **very high rates of data transmission**, due to the minimal amount of delay data is subjected to. This low latency is a key Quality of Service (QoS) metric which supports high performance across all of your Ethernet-enabled locations, empowering them to exchange data and access applications.

Other QoS metrics, such as low packet loss rates, help assure **data is transmitted with little or no chance of error**. These are critical considerations as you evaluate networking options for your organization.

HQ  
in Chicago



OFF-SITE  
BACKUP



BRANCH  
in Los Angeles



NEW BRANCH  
in Seattle



BRANCH  
in Dallas



## OFF-SITE DATA BACKUP

These days, nearly every organization has a great deal of sensitive data they need to protect—everything from their own internal financials and transactions, to personal information about their employees and customers. They are also charged with compliance requirements from several agencies of the Federal Government, the State Regulators in which they operate, as well as from financial industry groups.

You need to securely **back up your data frequently**, and **protect it** from unauthorized users, but at the same time, make it available to employees, customers and merchants who need ready access. Ethernet provides network connections that are **well suited for moving large data sets**, enabling you to back up your data in off-site locations. With connection speeds of up to 10Gbps, large file transfer is **very efficient and can be easily scaled** as your data requirements continue to grow.

HQ  
in Chicago



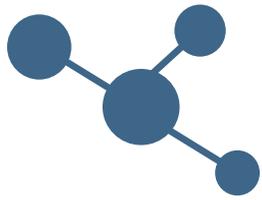
OFF-SITE  
BACKUP



BRANCH  
in Los Angeles

NEW BRANCH  
in Seattle

BRANCH  
in Dallas



# PRIVATE CONNECTIONS

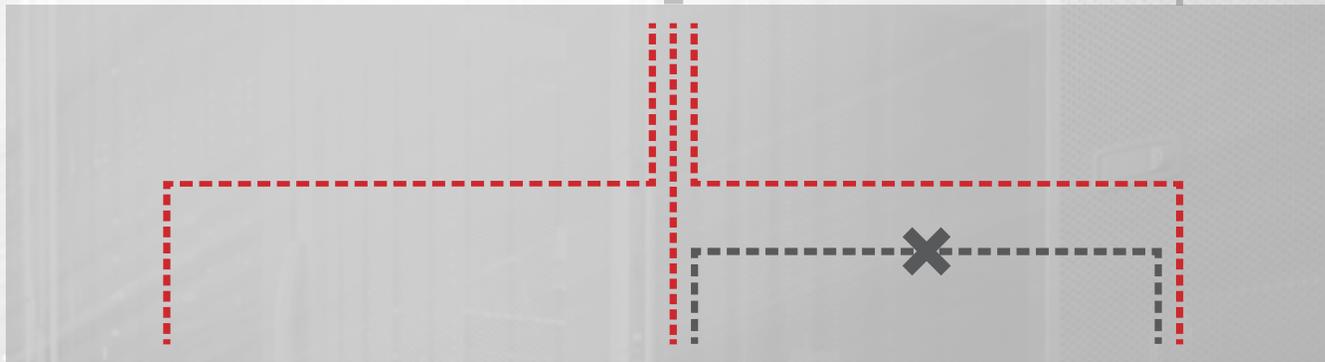
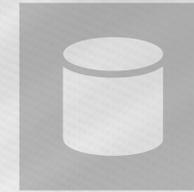
You may also need private connections—few businesses would be willing to send data over the open Internet—and Ethernet Private Lines and Ethernet Virtual Private Lines are **private, dedicated connections**.

In addition, **Ethernet networks can be segmented**, so data sharing can be managed. For example, your headquarters location can share data with all branches, but branches themselves can be restricted from sharing information with other locations. **An Ethernet network can be configured** to help these institutions with many elements of your compliance requirements.

HQ  
in Chicago



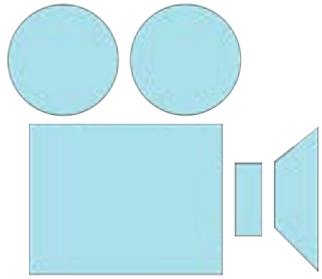
OFF-SITE  
BACKUP



BRANCH  
in Los Angeles

NEW BRANCH  
in Seattle

BRANCH  
in Dallas



## VOIP & VIDEO SERVICES

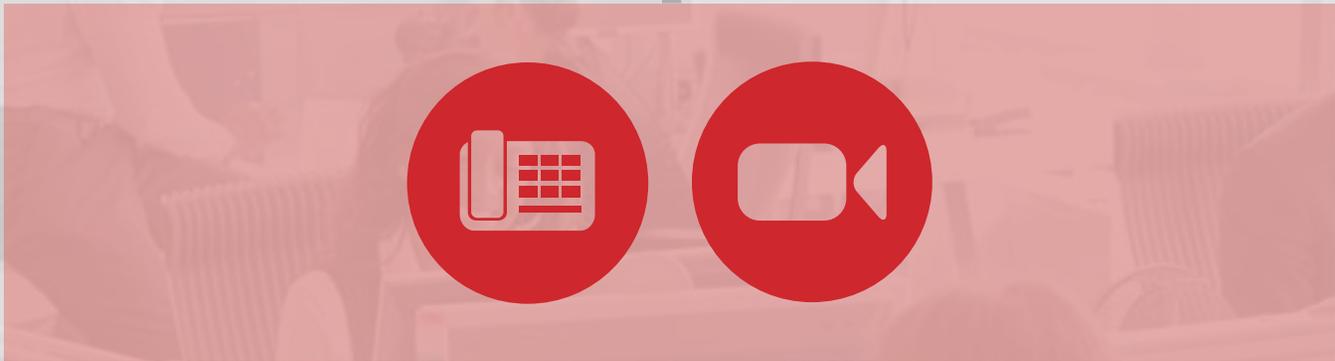
Keep staff productive by providing them with the tools they need. Many organizations are deploying applications like VoIP, video conferencing and cloud services to enhance collaboration across all of their locations. These tools provide **seamless communication services** that allow for improved workforce management, so staff can **work from anywhere**—a different branch, while they're traveling, or even from a home office.

Ethernet networks provide an **excellent network foundation** for VoIP and video, as the Class of Service (CoS) feature can prioritize this sensitive traffic, enabling clear voice connections and streaming video. Ethernet is also ideal, as it can share these services across all locations, reducing duplication of services, expensive equipment and the headache of supporting multiple networks.

HQ  
in Chicago



OFF-SITE  
BACKUP



BRANCH  
in Los Angeles



NEW BRANCH  
in Seattle



BRANCH  
in Dallas



# INTERNET ACCESS

Internet services can also be shared across an Ethernet network, providing significant advantages for your business. Typically, a single, large Internet connection can be purchased and **shared across all locations at a lower cost** than just separate smaller connections at each location. This also helps to eliminate or reduces the need for each site to enter into separate provider contracts, and provides a **more robust connection**.

WiFi services can be provided to staff—as well as customers—using this same shared Ethernet connection. In addition, the single entry point of Internet access can simplify the task of securing this Internet port, and help you to consistently block inappropriate IP addresses, and to filter content.



# Before & After

The business is burdened with **costly legacy systems** that are **time consuming to maintain**

**Challenged to provide business tools** like VoIP, video and cloud-based applications that boost business productivity

Stuck with **lower bandwidth speeds** that slow down your business

**Aging hardware and complex infrastructure** introduce risk in terms of failures and lack of business continuity capabilities

**Lack of flexibility** limits the ability of the business to adapt to changing market needs

**Reduced cost** and **simplified management**

Provide staff with the **collaboration and productivity tools** they need—in the office or on the road

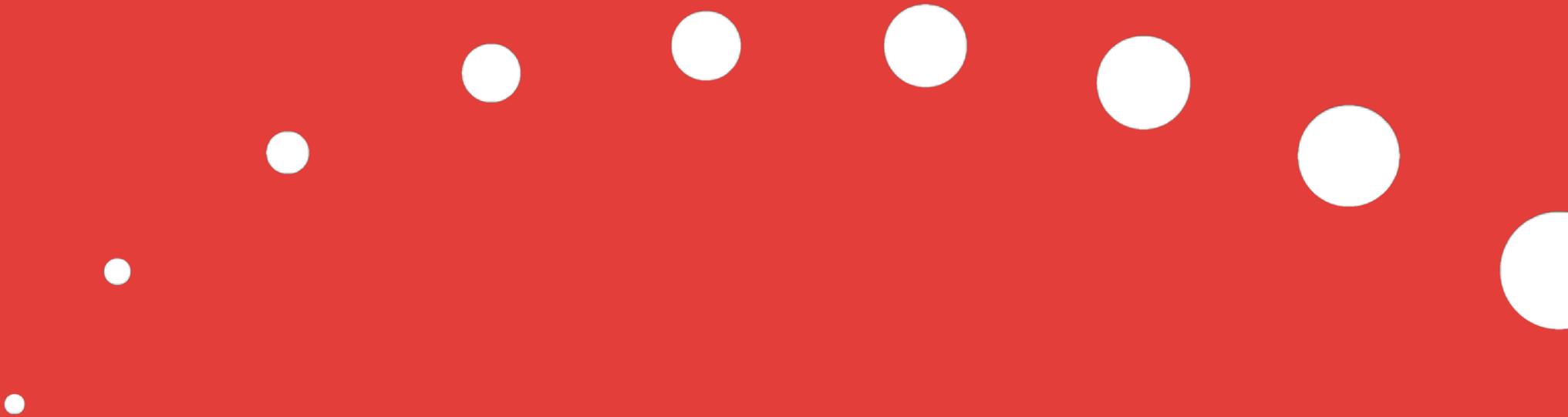
**Easily increase bandwidth** to meet user demand

**Single, simplified network** with robust service level agreements and high levels of availability and redundancy

An **agile infrastructure** that provides a competitive advantage for the business



To find out if Ethernet is right  
for your organization, [click here](#)



**Thank you**