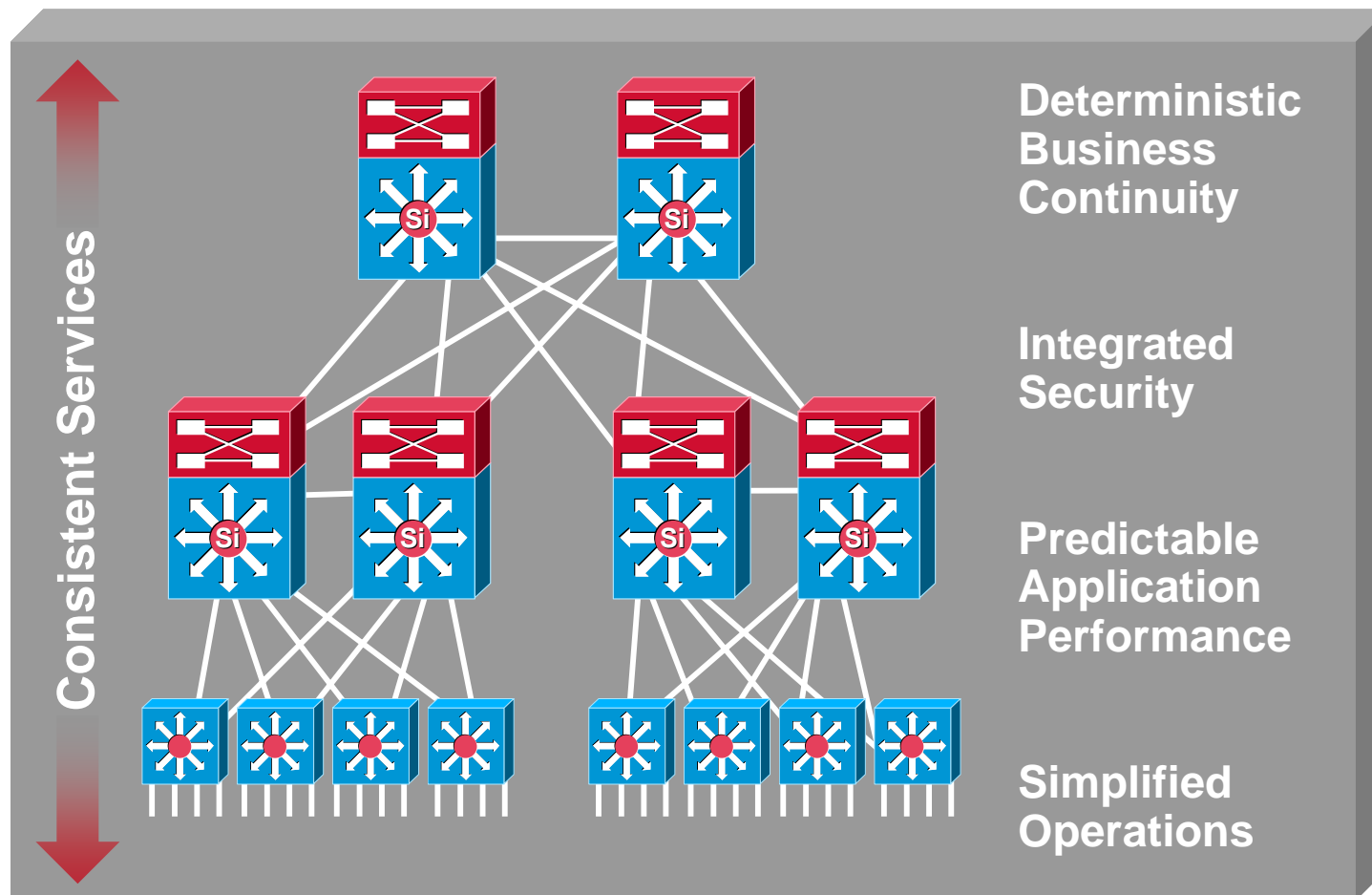




# Resilient Services Power the Wiring Closet Customer Proof Points

# Changing Network Requirement

## Any-to-Any Model



- Any-to-any traffic flow
- Real time
- Centralized and distributed
- Multimedia
- New traffic patterns

**Valuable Services Must Be Present Throughout**

# Core and Distribution May Be Ready But Does Your Wiring Closet Deliver?

## The Baseline for Today's Enterprise Campus Networks



### Self Defending

- Security is embedded at every level of the network
- The network protects itself against user-born threats



### Resilient Services

- Resilient, available anywhere and anytime
- Scalable, adaptable to support rapid IT growth and enable business agility



### Ready for Real-Time Applications

- Provides a single, unified communications system including voice, video, collaboration, wireless, storage back-up



# Cisco Customers

## Availability Proof Points

“Reliability is most important to us,” says James Mullins, IT Coordinator for Emergency Medical Services Authority (EMSA), Oklahoma City. “We strive for at least ‘seven-nines’ (99.99999 percent) uptime because we provide life-critical services. We chose Cisco Systems® and the Cisco® Catalyst® 4507R switches for these reasons.”



“We have a high level of confidence in the solution Cisco offers; whatever area of technology we move into, the Cisco network will be reliable and highly available,” says Dean Coyle, Network Analyst, Central DuPage Hospital. (Cisco Catalyst 6500 Series switches)



“The Cisco solution provides far better reliability than our previous network. At the same time, it has improved network performance 10 to 25 percent and has saved us a lot of money,” says Madge Meyer, Executive VP, State Street Bank (Cisco Catalyst 6500 and 3750 Series switches).



“The main benefits of our upgraded network are reliability and throughput. One of the reasons we chose Cisco was because the Cisco Catalyst 6500 Series switches are proven and dependable,” says Troy Hottovy, Director of Technology and Security, Saint Luke's Hospital of Kansas City.



# Future-Proof Network for IPT and Wireless LAN

## Emergency Medical Services Authority (EMSA), Oklahoma City, OK

### Customer Challenges

- Improve network reliability and stability
- Upgrade all connectivity between all facilities
- Provide foundation for future IP-based applications, such as IPT and wireless LAN

### Solution

- Cisco® Catalyst® 4507R Switch with Sup IV, Cisco Aironet® Wireless, Cisco 3600 Series routers, Cisco PIX® firewalls

### Net Multiplier Effect

- Eliminated unscheduled down time
- Enabled the deployment of wireless LANs
- With support for data, voice, and video, the Cisco Catalyst 4507R switches have eliminated the need for additional backbone capacity or multiple additional network devices
- EMSA's dispatch and billing systems transparently share data, eliminating manual data re-entry and significantly streamlining account processing



**“Reliability is most important to us,” says James Mullins, IT coordinator for EMSA. “We strive for at least ‘seven-nines’ (99.99999 percent) uptime because we provide life-critical services. We plan to build on our network foundation to deploy new functionality, such as voice over IP (VoIP). We chose Cisco Systems and the Cisco Catalyst 4507R switches for these reasons.”**

# Reduced Costs with Cisco Medical-Grade Network

## Central DuPage Hospital, Winfield, IL

### Customer Challenges

- Rapidly deploy new medical applications and services for competitive differentiation
- Contain IT administration costs while growing the network

### Solution

- Cisco® Catalyst® 6500 Series switches with WLSM, data center-wiring closets. Cisco 800 Series Router, Cisco CallManager, Cisco MDS 9500 Series Multilayer Directors

### Net Multiplier Effect

- Enhances facility reputation for supporting the latest medical applications and services
- Improves healthcare staff productivity
- Minimizes network administration and related operating expenses



“Cisco provides a compelling advantage with an array of services and a wide variety of products that all cohesively work with each other, allowing us to offer our users many capabilities.”

Dean Coyle, Network Analyst

# Specialized Focus to Improve Investor Care

## State Street Bank

### Customer Challenges

- Disparate voice and data infrastructure result in higher CapEx and OpEx
- Disparate infrastructures are not conducive to productivity enhancing applications

### Solution

- Comprehensive Cisco® network infrastructure (Cisco 3800 ISRs, Cisco Catalyst® 6500 and 3750 Series switches) with voice solution including Cisco IPC, IPCC, and Cisco Unity®

### Net Multiplier Effect

- Grow productivity in staff to 68% with a 34% reduction in individuals
- Reduced telecom costs 40%
- Network utilization improved 10–25%



**“The Cisco solution provides far better reliability than our previous network. At the same time, it has improved network performance 10–25%, and has saved us a lot of money.”**

**Madge Meyer, Executive VP**

# Cisco Catalyst 6500 Series Ensures High Reliability

## Saint Luke's Health System, Kansas City, MO

### Customer Challenges

- Ensure high network reliability and application availability
- Enable deployment of wireless, storage area network, and video applications

### Solution

- Cisco® Catalyst® 6500 Series switches, Cisco MDS 9500 Series Multilayer Directors

### Net Multiplier Effect

- Created redundant, resilient high-performance network for delivering imaging and other advanced healthcare applications
- Deployed wireless access to critical applications including prescription ordering and charting
- Enabled maximum monitoring effectiveness for cardiac intensive care patients



**“A major benefit of our new network is reliability—having patient data available 24 by 7.”**

**Troy Hottovy, Director of Technology and Security**

# Cisco Customers

## Security Proof Points

“To implement university-wide security services, we needed a *consistent infrastructure across the institution running a centralized security policy*,” says Peter Bartz, Design Manager—Network and Telecom Support, University of Minnesota (Cisco® Catalyst® 6500 and 3750 Series switches).



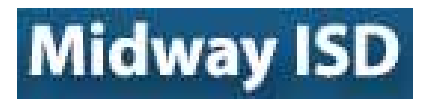
“We chose Cisco for its market leadership. Its equipment capabilities were superior to what we had been experiencing, and we knew that the *Cisco platform offered high levels of security*,” says Rich Johnson, CIO, Clarian Health Partners (Cisco Catalyst 4507R and Cisco Catalyst 3750 Series switches).



“Nlets, the international justice and *public safety information-sharing network*, is defined by the fact that it is always there. It is mission critical, it is life or death, and we need equipment we can rely on. That is why we chose Cisco,” says Frank Minice, Director of Operations, Nlets. “We chose a *Cisco network solution because of its security, resilience, and flexibility to add new members and services*,” says Steve Correll, Executive Director (Cisco Catalyst 4500 Series switches).



“It is nice not to have to be concerned about our network switches or routers failing or about *new security vulnerabilities*. We do not have to worry about that with Cisco—their products are just reliable,” says Adam Feind, Director of Technology and Information Systems for the Midway Independent School District of Waco, Texas (Cisco Catalyst 6500 and 3550 Series switches).



# Ensuring Security, Reducing Complexity in Education

## University of Minnesota

### Customer Challenges

- Dozens of disparate departmental networks
- Provide secure environment for over 50,000 students and high-visibility research endeavors
- Improve network service levels while simplifying network management

### Solution

- Established single IP/MPLS network that enforces consistent security measures, readily enables new service and application deployments, and consolidates network and security management
- Deployed 10GbE backbone and integrated security services using Cisco® Catalyst® 6500 and 3750 switches

### Net Multiplier Effect

- Minimized malicious attacks, eased security policy establishment and enforcement
- Centralized network management improved efficiency and consistency
- Readily adapt to new demands through system scalability, service integration



UNIVERSITY OF MINNESOTA

**“To implement university-wide security services, we needed a consistent infrastructure.”**

**“Our new network is far more manageable and reliable as a result.”**

**Peter Bartz, Design Manager  
Network and Telecom Support**

# Cisco Customers

## New Applications Proof Points

“The *Cisco*® *IP Communications solutions* give us a lot of flexibility for reacting to today’s changes and accommodating tomorrow’s growth. Having voice and data information readily available to our physicians and clinicians has taken us a long way,” says Jack Storey, Vice President and Chief Information Officer, Children’s Healthcare of Atlanta (Cisco Catalyst® 4507R and Cisco Catalyst 3550 Series switches).



“First we fixed our basic access issues and established a guaranteed bandwidth model for all of our desktop computers,” says Mike Burke, Director of Daytona Beach Community College’s Network Engineering and Services department. “After setting up a baseline model, we could start considering additional services that we could put over the network” (Cisco Catalyst 6500, 4500, and 3550 Series switches).



“Our Cisco foundation infrastructure is manageable and scalable. We’ll no longer find ourselves in the position of receiving funding for a *new application*, only to realize that deploying the application requires a much more expensive infrastructure upgrade. We can add bandwidth incrementally, as needed,” says Joe Russo, the Washington State Patrol’s communications engineering manager (Cisco Catalyst 3750 Series switches).



# Children's Healthcare of Atlanta Improves Communication Productivity, Resiliency

## Customer Challenges

- End-of-life on existing private branch exchange solutions demanded a replacement or new solution
- Aggressive growth required flexible, highly available telephony system
- Reduce total cost of ownership of network and telephony systems

## Solution

- Cisco® switching, routing, and wireless solutions
- Cisco IP Communications solutions

## Net Multiplier Effect

- Implemented advanced telecommunication services, centralized management
- Used existing investments in Cisco intelligent network infrastructure
- Dramatically improved resiliency, security, scalability, and productivity
- Reduced telecom-related costs



**“For us the Cisco Medical-Grade Network was more cost-effective to implement and maintain and it gave us significant flexibility for the future.”**

**Jack Storey, Vice President  
and Chief Information Officer**

# Cisco Customers

## Manageability Proof Points

“We suggested the Cisco® Catalyst® 3560 Series switches to the group in charge of the RF system at our facilities. We wanted to *easily configure, maintain, and monitor the network*. We knew the Cisco product had the right capabilities and could scale while remaining *easily manageable*. It met all of our expectations,” says Michael Mullen, Senior Technical Analyst, FedEx Ground.



“Routed Access *eases our management burden*, gives us more control over our security, lets us convert resources to a common Cisco IOS Software platform, and makes it *much easier to implement new projects*,” says Darrin Gannaway, Senior Network Engineer, San Antonio Water System (Cisco Catalyst 4500 Series switches).



“We have used Resource Manager to correct two major network problems, and I estimate that using *CiscoWorks tools saved us 64 hours of work*,” says Chad Smith, Senior Network Engineer, Alfa Mutual Life Insurance Company.



“By using the SWIM function in CiscoWorks RME to upgrade Cisco IOS® Software, it now takes only 8 hours of regular time—thus *saving us 92 hours of work every time a major software update comes out*,” says Bill Carte, CCIE—Sentinel Technologies, On-Site Senior Network Analyst, Illinois Department of Human Services.



# Water Agency Improves Network Availability

## San Antonio Water Systems

### Customer Challenges

- Alleviate bandwidth constraints at network edge
- Improve network availability and database application performance
- Maintain operation costs

### Solution

- Routed Access solution with Layer 3 routing capability in the wiring closet

### Net Multiplier Effect

- Halves network complexity and reduces network management burden
- Reduces new service implementation costs by 25%–30%
- Doubles bandwidth, eliminates congestion and improves security with minimal capital outlay



**“Routed Access eases our management burden and makes it much easier to implement new projects.”**

**Darrin Gannaway, Senior Network Engineer**

# Make On-Time Delivery

## FedEx

### Customer Challenges

- Keep the network infrastructure up to date with new capabilities while maintaining consistent configurations throughout
- Deliver power-over-Ethernet (PoE) capabilities to delivery terminals and hub sites for the package tracking system
- Deploy flexible, scalable networking solutions that eliminate the need for infrastructure replacement for at least five years

### Solution

- Cisco® Catalyst® 6509 switches, Cisco Catalyst 3560 and 3750 switches
- CiscoWorks LAN Management Solution

### Net Multiplier Effect

- Maximized network availability and performance to assure on-time package delivery
- Simplified management and troubleshooting with consistent deployments
- Established a foundation for delivering future applications, such as Cisco IP telephony solutions



“We wanted to easily configure, maintain, and monitor the network.”

“We knew the Cisco product had the right capabilities and could scale while remaining easily manageable. It met all of our expectations.”

Michael Mullen, Senior Technical Analyst, FedEx Ground

# In Summary

- IP unified communications and collaboration is not about cheaper phone calls—it's about **transforming the communications experience**
- **Campus network requirements are increasing**
  - Deterministic business continuity
  - Integrated security
  - Predictable application performance
  - Simplified operations
- Cisco® delivers **resilient services**, and extends unique **service consistency to the wiring closet**



# CISCO SYSTEMS

