

■ Data Center Services for  
*Business-Critical Continuity*™

*Mission-Critical Services To Keep You Up And Running*



 **Liebert**®

  
**EMERSON**  
Network Power

**All of your mission-critical service needs are handled seamlessly, and you are never left out of touch.**

## Manage The Health Of Your Entire Network.

Today's complex facility support systems – everything from precision air conditioning to UPS and alarm monitoring – have become critical in every sense of the word. They make up the infrastructure that keeps your vital computing, communications and control systems running 24 hours a day. A failure in any area can have a cascading effect across your enterprise – and a devastating impact on your operations.

That's why you need to manage the health of your entire network. It's why you need a service partner who can offer you *Business-Critical Continuity*<sup>™</sup>. Exactly the kind of grid-to-chip protection Emerson Network Power's service solution provides. In fact, it's the kind of support that more than 35,000 customers in 70 countries around the world count on to minimize system emergencies and interruptions, and maximize availability.

What makes us so different from other service providers? For starters, we provide superior performance in three critical areas: uptime assurance, downtime recovery, and return on equipment investment. And we're dedicated to blending insight and innovation with sophisticated technologies to deliver ever-increasing system availability.

Emerson Network Power is the industry force behind the next generation of mission-critical services. These services are designed to adapt to the changing needs of your business. We have the deepest, most comprehensive global service presence in the industry. And we're your only source of instant access to vital information on your Liebert<sup>®</sup> and Emerson<sup>®</sup> products. We provide such an array of services for one simple reason: so you have the time and resources to concentrate on your own customers. We take care of the technology; you take care of your business.



*Emerson Network Power's approach to servicing your critical space covers all aspects of availability and performance, from individual power and cooling equipment to the entire mission-critical system.*

## Proper Service Enables Business-Critical Continuity<sup>™</sup>.



A comprehensive service program, essential to continuous system availability:

- The most experienced and extensive customer engineer (CE) network
- Industry leader in next-generation data-center service solutions
- Total mission-critical service capabilities
- Proactive system updates

Delivering the fastest system recovery in the industry:

- Industry-best first-time fix rate
- Extensive inventory for parts availability
- Industry's most experienced technical support group
- Average on-site response time less than two hours

Most effective way to:

- Maximize product life
- Avoid the cost of business downtime
- Extend the useful life of critical infrastructure
- Maximize energy efficiency

MARY PEZZELLA,  
SENIOR CUSTOMER  
RELATIONSHIP MANAGER  
EMERSON NETWORK POWER

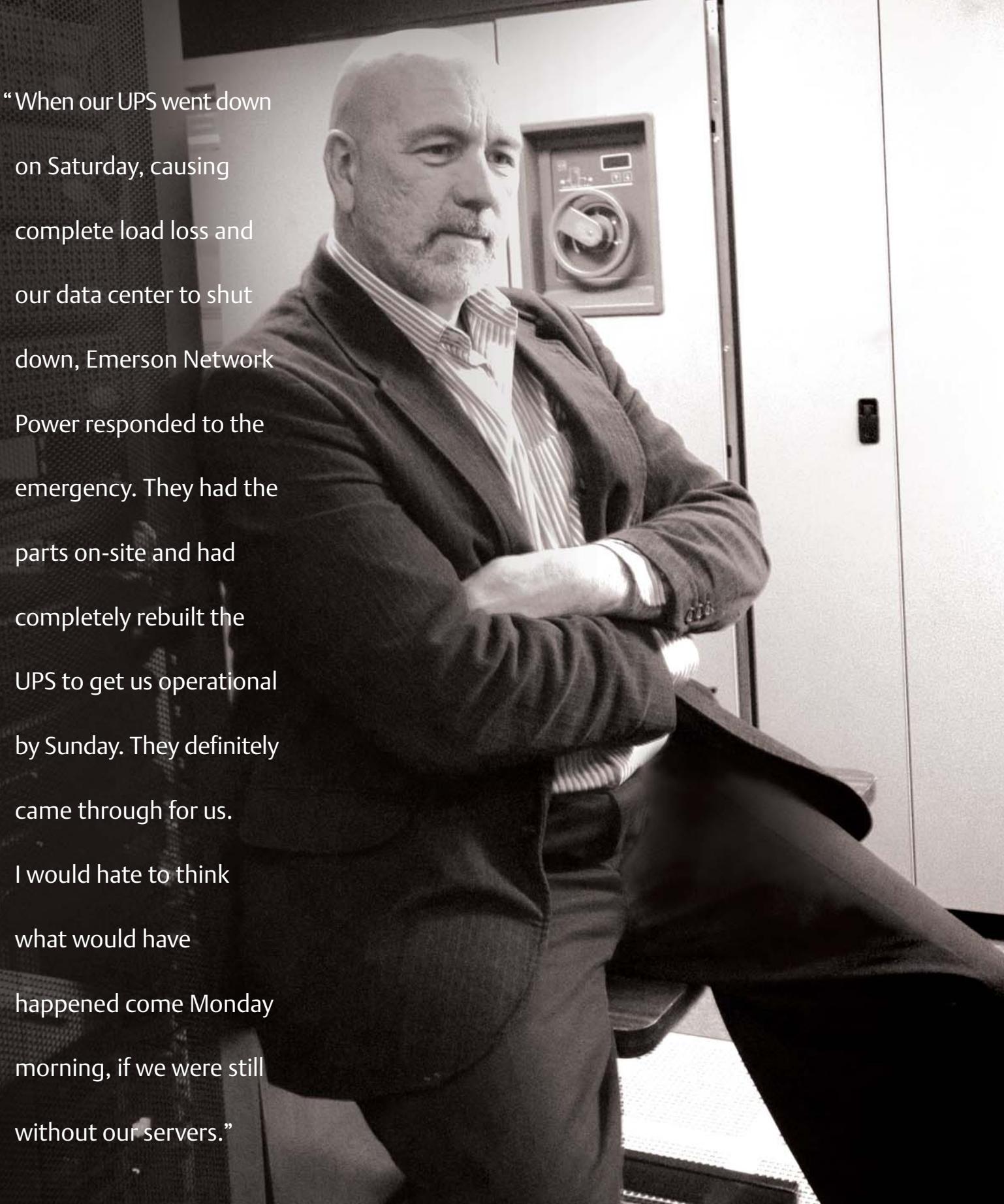
“In the midst of a crisis,  
the last thing you  
need to worry about  
is whom to call. As  
your single-source  
partner, we take care  
of the technology, so  
you can take care of  
your business.”



PETER MCINTYRE,  
DIRECTOR OF MAINTENANCE OPERATIONS  
PACE UNIVERSITY

“When our UPS went down on Saturday, causing complete load loss and our data center to shut down, Emerson Network Power responded to the emergency. They had the parts on-site and had completely rebuilt the UPS to get us operational by Sunday. They definitely came through for us.

I would hate to think what would have happened come Monday morning, if we were still without our servers.”



**Emerson Network Power's service solution is designed to look at the needs of your entire enterprise.**

## Uptime Assurance

# Ensure Performance When You Need It Most.

Getting ahead of your problems today can save time – and money – tomorrow. That's why we offer you a comprehensive service solution that is tailored to meet the needs of your entire enterprise. Only Emerson Network Power has the resources and expertise to provide a system-wide maintenance solution, from an individual component to an entire data center.

With such extensive service offerings, our solutions give you network availability and total peace of mind. And because we're part of a \$20 billion corporation, you know we'll be there to support all of your future needs.

### Component Services:

#### UPS

- Preventive maintenance
- Site-acceptance testing
- Power-distribution unit testing and maintenance
- Proactive system updates



- On-site and depot repair capabilities
- 100% parts, labor and travel coverage
- 24x7 emergency service
- 24x7x365 factory-certified technical support

#### Generator

- Preventive maintenance
- Cooling, fuel, starting, air-intake and lubrication systems service
- Control panel and voltage regulator maintenance



#### Battery

- Preventive maintenance
- Monitoring services
- Battery-capacity testing
- Spare batteries on site



- Replacement services
- 24x7 emergency service
- 24x7x365 factory-certified technical support

#### Automatic Transfer Switch & DC Power

- Preventive maintenance
- Power plant, batteries and associated equipment inspection
- IEEE battery load testing
- Rectifier-redundancy and battery-reserve-time calculation
- Site and grounding audits



- Equipment load-sharing analysis
- Proper-operation assurance
- Voltage-drop and excessive-heat inspection
- Lubrication and torque check

#### Critical Cooling

- Preventive maintenance
- Thermal assessments
- Full-service contracts on major parts and components
- 100% parts, labor and travel coverage
- 24x7 emergency service



### System-Wide Services:

#### Availability Assessment Services

- Data center assessment
- Infrared inspection
- Power audit
- Design audit
- Harmonic analysis



- One-line diagram update
- Short circuit and coordination study
- Arc flash analysis
- Power-quality assessment
- Additional testing services

#### Enterprise Remote Monitoring

- System-wide monitoring solutions for your entire data center
- Enhanced alarm detail
- Alarm diagnostics
- Monitoring and trending of system data



**Today your entire network is mission critical. Our services ensure the fastest recovery, so your system is available as quickly as possible.**

## Downtime Recovery

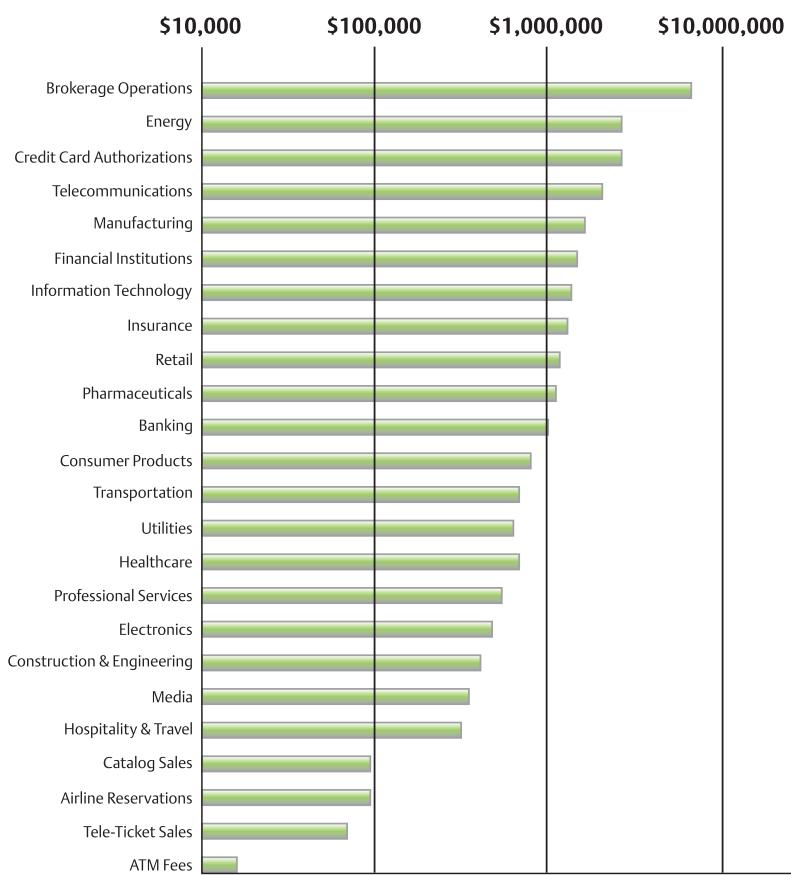
### Cut The Cost Of Downtime.

Today your entire network is mission critical. And that means the risk – and the cost – of downtime continues to rise, so quick recovery is crucial.

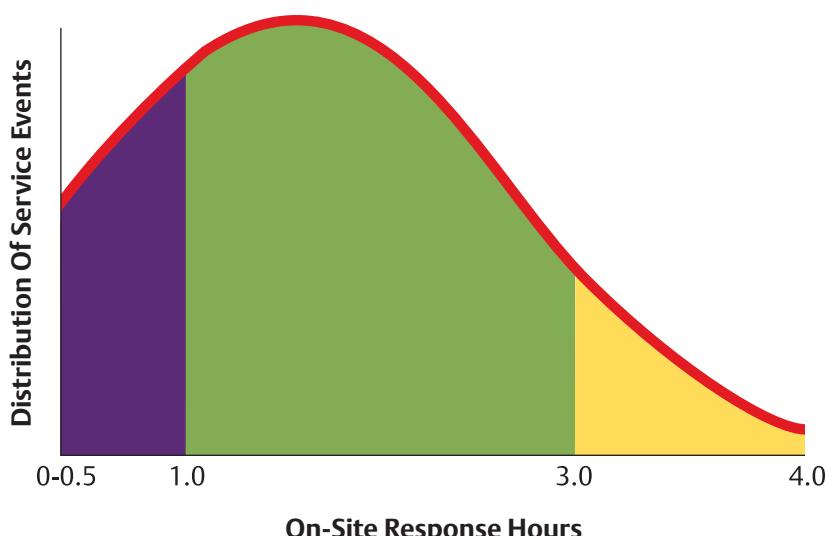
Emerson Network Power brings you a time-tested record of performance. Our on-site response time averages just 1.97 hours. But that's just one reason that nearly 100 percent of our customers recommend us.

- Our 375 world-class certified engineers undergo more than 60,000 hours of technical training every year. And our team is available 24x7x365 to provide factory-engineering and application support.
- We offer a comprehensive, advanced logistics-support system, with more than 7,000 unique parts stocked. We fill 97 percent of emergency parts orders in less than 24 hours, and all parts come with factory certification.
- Our safety record is unparalleled. So is our commitment to training, in everything from low-voltage electric and OSHA lock-out/tag-out to routine safety audits and adherence to ISO standards.
- Our Customer Resolution Center answers more than 100,000 calls per year, with an average resolution time of only two and a half minutes. At Emerson Network Power you never get a machine; one of our professionals answers every call.

#### Cost Of Downtime Per Hour<sup>1</sup>



#### On-Site Response Time For Emerson Network Power Service Contract Customers<sup>2</sup>



<sup>1</sup> META Group Study, as reported in DM Review online

<sup>2</sup> Analysis of Emerson Network Power service data between the years 2002 and 2007

**“UPS units receiving regular preventive maintenance (PM) outperform those receiving sparse or no PM, when judged on total operating cost or outage performance.”**

– John Thornton, PhD, statistical expert on mean time between failures (MTBF)

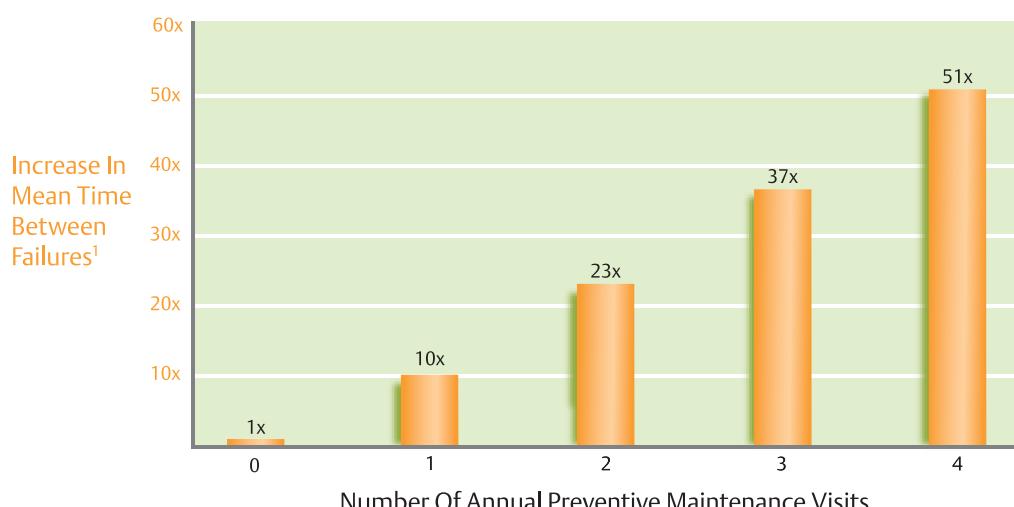
## Return On Investment

### Protect Your Bottom Line Too.

Protecting the performance of your mission-critical equipment isn't the only benefit an Emerson Network Power™ service solution brings to you and your business. We bring bottom-line protection as well. Ask yourself this question: Why increase equipment vulnerability by not maintaining the power and environmental systems that support it?

Preventive maintenance (PM) practices can actually reduce your overall cost of ownership. Equipment that is serviced by the OEM operates much more reliably and efficiently, reducing costly downtime<sup>1</sup>. We've found that a UPS system receiving semiannual preventive maintenance from the OEM has a mean time between failures (MTBF) 23 times greater than those without a regular maintenance program.

#### The Business Case For Regular Maintenance

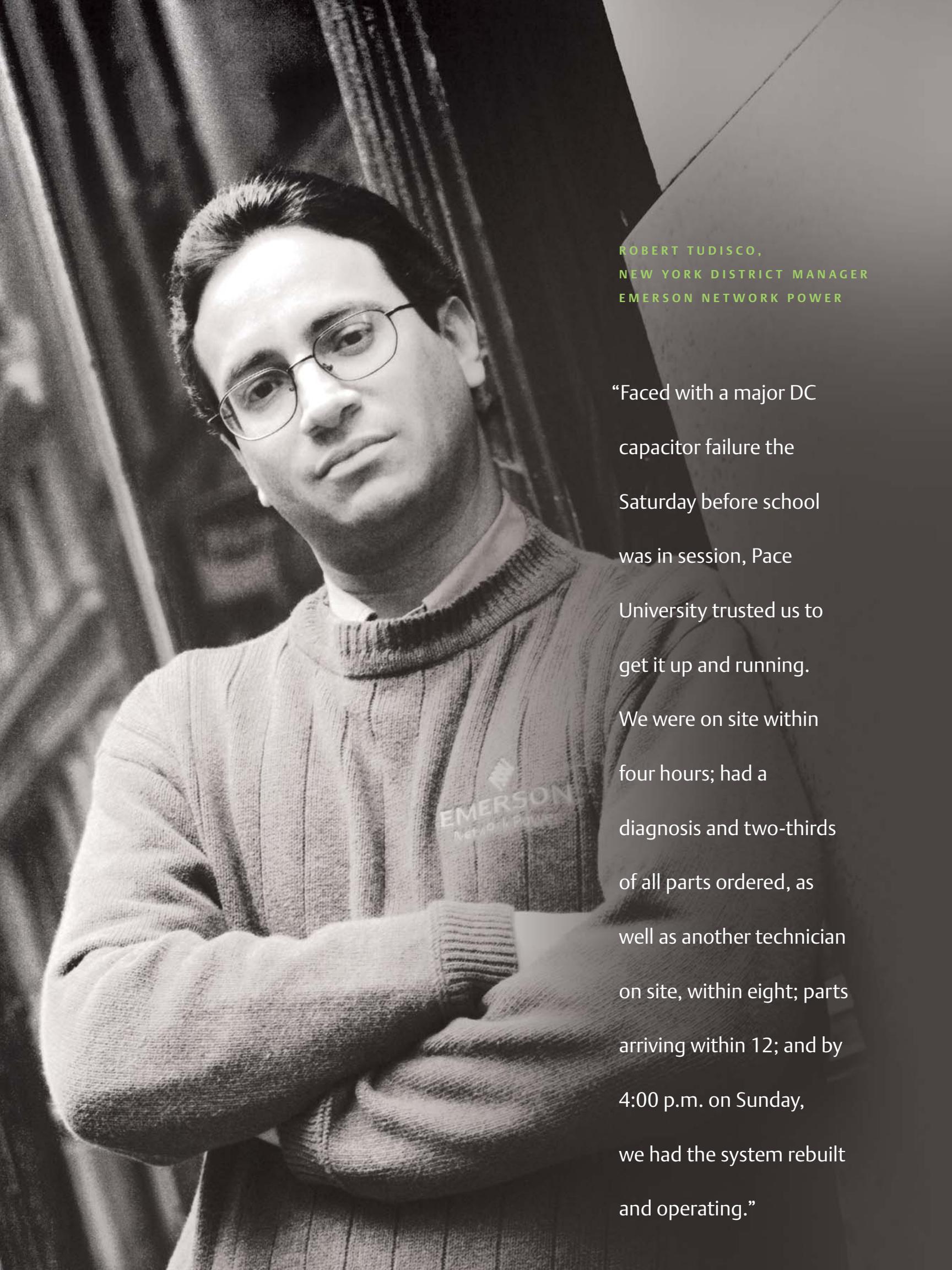


Regular OEM preventive maintenance increases the mean-time between failures.

For instance, the MTBF for a system that receives one annual PM is 10 times greater than a system that receives zero PM.

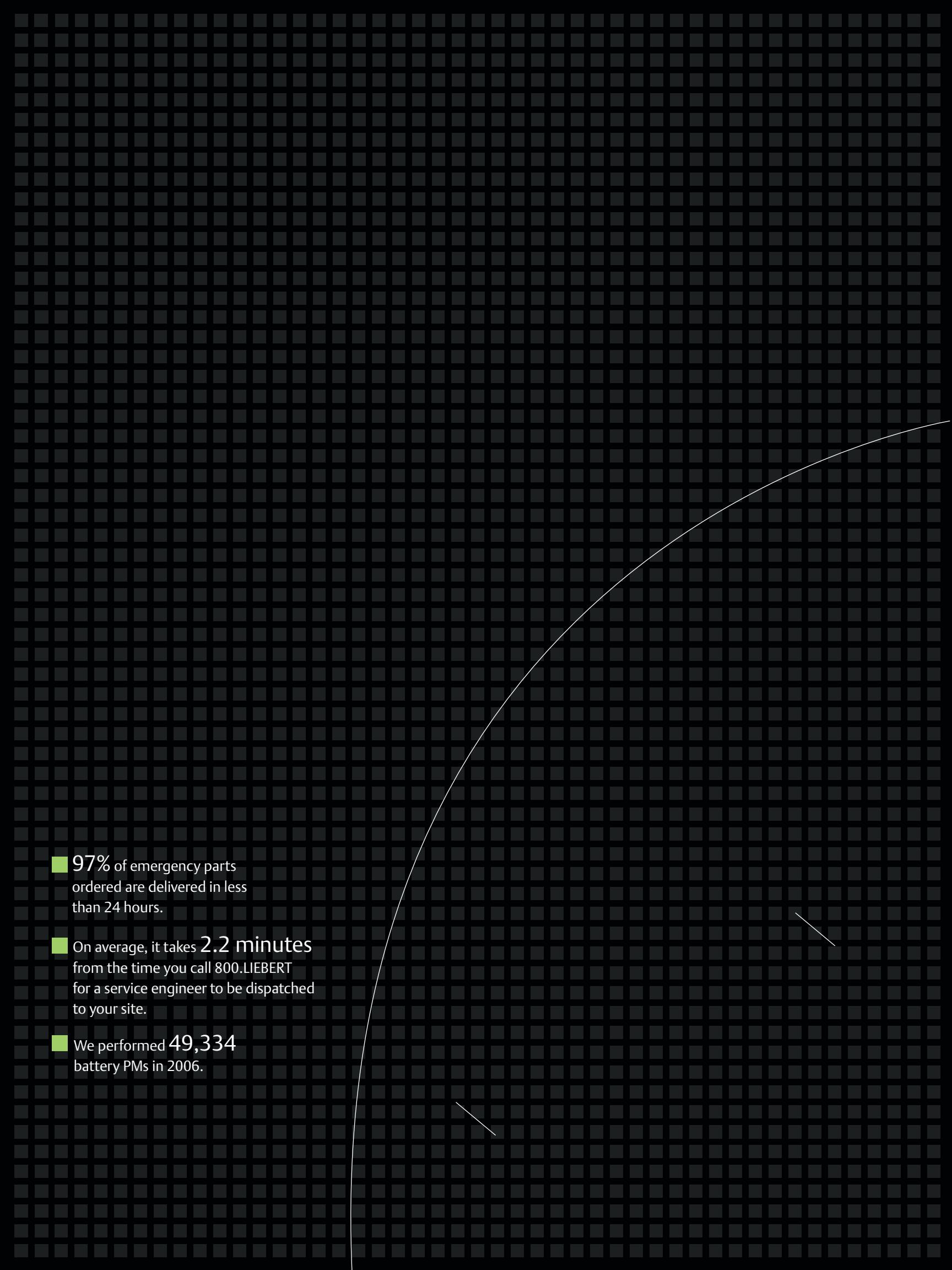
By contrast, a system that receives four annual PMs, as opposed to zero PMs, increases its duration between failures by 51 times.

<sup>1</sup>Data is based on MTBF analysis for three-phase UPS systems ( $\geq 100\text{kVA}$ ) with an Emerson Network Power service agreement between 2002 and 2007.



ROBERT TUDISCO,  
NEW YORK DISTRICT MANAGER  
EMERSON NETWORK POWER

“Faced with a major DC capacitor failure the Saturday before school was in session, Pace University trusted us to get it up and running. We were on site within four hours; had a diagnosis and two-thirds of all parts ordered, as well as another technician on site, within eight; parts arriving within 12; and by 4:00 p.m. on Sunday, we had the system rebuilt and operating.”



- 97% of emergency parts ordered are delivered in less than 24 hours.

- On average, it takes **2.2 minutes** from the time you call 800.LIEBERT for a service engineer to be dispatched to your site.

- We performed **49,334** battery PMs in 2006.

### The *Business-Critical Continuity™* Promise

*Business-Critical Continuity™* is our promise that your network infrastructure will not go down and disrupt your business. Emerson Network Power consistently anticipates your rapidly changing business environment, to ensure that your business backbone is protected and always running. With Emerson Network Power, you have the peace of mind that comes with knowing your business will run continuously and seamlessly. And you know your network infrastructure is delivering value to your customers.

To find out more about what Emerson Network Power can do for you, visit [EmersonNetworkPower.com](http://EmersonNetworkPower.com) today.

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### **Emerson Network Power.**

The global leader in enabling *Business-Critical Continuity™*.

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 Embedded Power  
 Monitoring

 Outside Plant  
 Power Switching & Controls  
 Precision Cooling

 Racks & Integrated Cabinets  
 Services  
 Surge Protection

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