

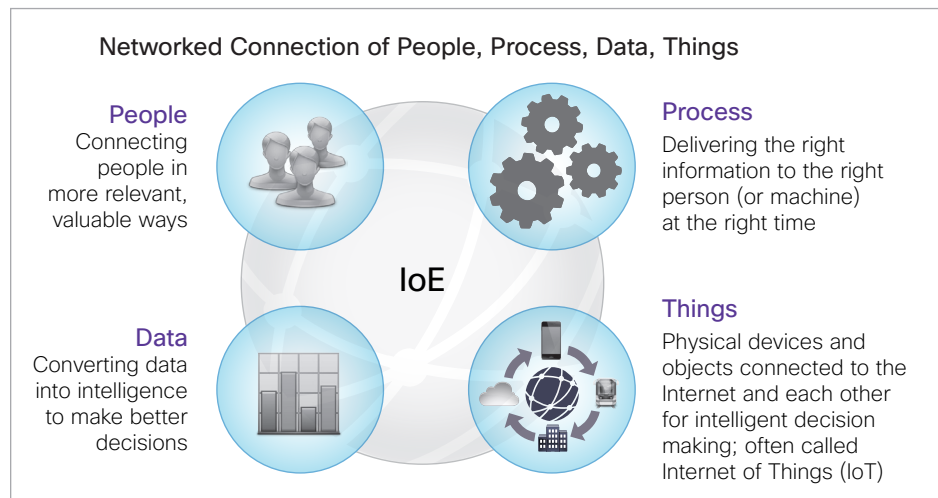
Internet of Everything



Connect the Unconnected with IoE

People. Process. Data. Things. Yesterday, they functioned independently. Today, the Internet of Everything (IoE) brings them all together by combining machine-to-machine (M2M), person-to-machine (P2M), and person-to-person (P2P) connections.

Information extracted from these networked connections creates new capabilities, richer experiences, and incredible economic opportunity. Cisco delivers architectures, solutions, technologies, and consulting services that help you capture the value of IoE.



Changing Our World Through New and Better Connections

Imagine a sensor on a car or medical device that sends information through the network to a database in real time. Here, data is analyzed and the results are used to automatically improve fuel efficiencies or enhance patient care. This is the new IoE reality.

Cisco predicts that between now and 2022, US\$19 trillion in value is at stake for organizations willing to take advantage of the immense IoE opportunity.¹ But to realize the potential of IoE, you will need to act quickly, powered by an efficient infrastructure. Technology architectures need to be streamlined – to create the agility to keep pace with rapid change. The infrastructure must help you gain insights from IoE data to help your organization anticipate trends. And in an environment of increasing connectedness, it is essential to deal with security threats in a comprehensive and proactive manner.

¹ The Internet of Everything, Cisco IoE Value Index Study, Frequently Asked Questions, Cisco Inc., 2013.

Solutions of Value

Cisco can help you capture your share of IoE opportunity:

- **Connect the unconnected:** Support M2M, M2P, and P2P connection types with our scalable, high-performance, and efficient next-generation networking and mobility solutions.
- **Gain insight:** Unlock IoE data to help predict customer behavior, asset performance, and business outcomes using network-based and real-time streaming analytics, as well as Cisco® Big Data solutions.
- **Be agile:** Automate tasks and service provisioning. Deliver applications faster. Simplify management across environments. And automatically adapt to changes in demand. Cisco ONE, Cisco Unified Framework, and Cisco Cloud Portfolio make it possible while using less hardware and reducing IT complexity.
- **Be fast and secure:** An integrated, platform-based security solution means you no longer have to trade off performance for security. Protect all your connections and data with security that is proactive, dynamic, intelligent, and scalable.
- **Seek expert guidance:** Address your business challenges and identify unique IoE opportunities by taking advantage of the expertise of Cisco Consulting Services. We help you develop a customized IoE roadmap to improve profitability, accelerate innovation, manage risk, and much more.

Real-World Benefits

What benefits can you expect from IoE solutions powered by Cisco technology?

- Faster path to strategic insights and increased profitability
- Rapid delivery of differentiated IoE-enabled services and experiences
- Security that helps enable IoE business because it's integrated, open, continuous, and pervasive
- Sustainable competitive advantage

"It is up to all of us to get involved to ensure that the Internet, as IoE unfolds, continues to be a powerful force for improving people's lives."

– Dave Evans, Chief Futurist, Cisco



Why Cisco?

The future is here. Get ready to take your share of IoE Value at Stake. From next-generation networks to industry-leading mobility, cloud, and video, Cisco provides the integrated architectures that connect people, process, data, and things. Our security solutions are designed for the IoE era, and they provide high-performance end-to-end coverage that is intelligent and proactive. Our proven portfolio of solutions creates the foundation for a wide range of IoE-ready vertical and horizontal offerings. And through Cisco Consulting Services, we will help you develop the customized strategies and solutions needed to take full advantage of the IoE opportunity.

Learn More

For more information, visit [Tomorrow Starts Here](#).

Industry Use Cases

As the physical world connects to the Internet and everyday objects become intelligent, the result is incredible opportunities. Are you ready to embrace IoE? The following use cases reveal what's possible.

IoE in Action: Retail

A customer enters a store. She selects a pair of jeans for purchase. Weight sensors on the shelf communicate through the cloud to the retailer's data center that product inventory has changed. Inventory is replenished based on real-time analytics and trends.

Table 1. IoE Possibilities for Retail

New Connections	What They Mean
Machine-to-Machine	
<ul style="list-style-type: none"> Shelf sensors Parking-space sensors IR motion sensors Weight mats Environment sensors Door sensors Mobile payment 	<ul style="list-style-type: none"> Inventory visibility Automated ordering process Flexible payment options Energy optimization

New Connections	What They Mean
Machine-to-People	
<ul style="list-style-type: none"> Digital signage Connected cameras and analytics Wi-Fi badges Gesture recognition Point-of-sale Kiosk 	<ul style="list-style-type: none"> Behavioral insight Personal-Social/Local/Mobile content Endless aisle omnichannel
People-to-People	
<ul style="list-style-type: none"> Shopper mobile devices Store associate mobile devices Immersive video Social media Contact center E-commerce site 	<ul style="list-style-type: none"> On-demand expert advice Collaborative development On-demand training

IoE in Action: Manufacturing

In a manufacturing plant, assets are affixed with wireless sensors. Using remote monitoring technology, plant managers locate and track production inventory on the plant floor and within the supply chain in real time.

Table 2. IoE Possibilities for Manufacturing

New Connections	What They Mean
Machine-to-Machine	
<ul style="list-style-type: none"> Smart factories (machine connectivity and sensors) Remote asset monitoring Wireless inventory tracking 	<ul style="list-style-type: none"> Predictive maintenance Reduced production delays Real-time inventory visibility Real-time energy optimization
Machine-to-People	
<ul style="list-style-type: none"> Fleet and transportation monitoring Product sensors Mobile marketing 	<ul style="list-style-type: none"> Operational efficiencies End-user insight Increased revenue
People-to-People	
<ul style="list-style-type: none"> Video collaboration Mobile plant-floor collaboration Connected learning 	<ul style="list-style-type: none"> Faster innovation Employee productivity Lower costs



IoT in Action: Public Sector

A driver in search of a parking spot navigates the streets of a busy town. Meanwhile, a parked vehicle leaves its spot. As the car takes off, an underground sensor detects the vacancy and sends a signal in real time, notifying the motorist of the available parking space through a mobile app.

Table 3. IoT Possibilities for Public Sector

New Connections	What They Mean
Machine-to-Machine	
<ul style="list-style-type: none"> • Smart buildings • Smart lighting • Smart payments • Intelligent public transit • Smart grid 	<ul style="list-style-type: none"> • Citizen and employee experiences • Improved asset use • New revenue streams • Energy optimization
Machine-to-People	
<ul style="list-style-type: none"> • Video surveillance • Smart parking • Water management • Gas monitoring • Disaster response • In-patient monitoring 	<ul style="list-style-type: none"> • Enhanced security • Increased revenue and compliance
People-to-People	
<ul style="list-style-type: none"> • Telework • Bring-your-own-device (BYOD) environments • Connected learning • Travel avoidance 	<ul style="list-style-type: none"> • Employee productivity • Lower costs