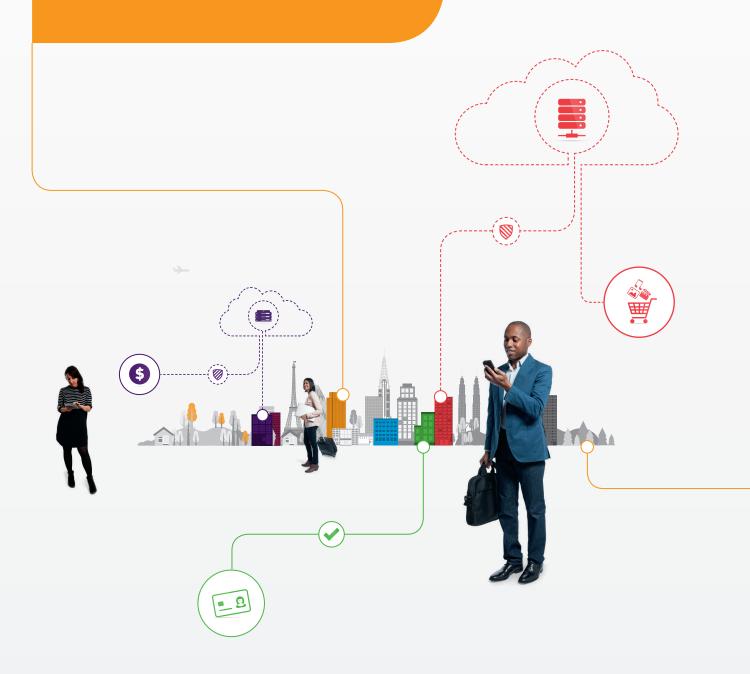


CORPORATE BROCHURE

Trust in a connected world



Who we are

As the global leader in digital

security, Gemalto brings trust to an increasingly connected world.

Our know-how helps authenticate identities and protect data so they stay safe and enable services in personal devices, connected objects, the cloud and in between.

Our solutions are at the heart of modern life, from payment to enterprise security and the internet of things – enabling our clients to deliver secure digital services for billions of individuals and objects.





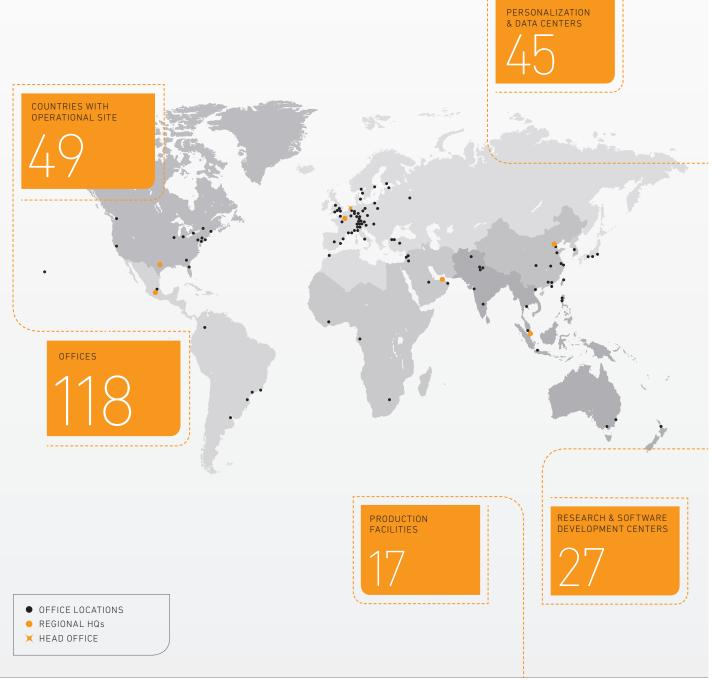
Our company





Our global presence

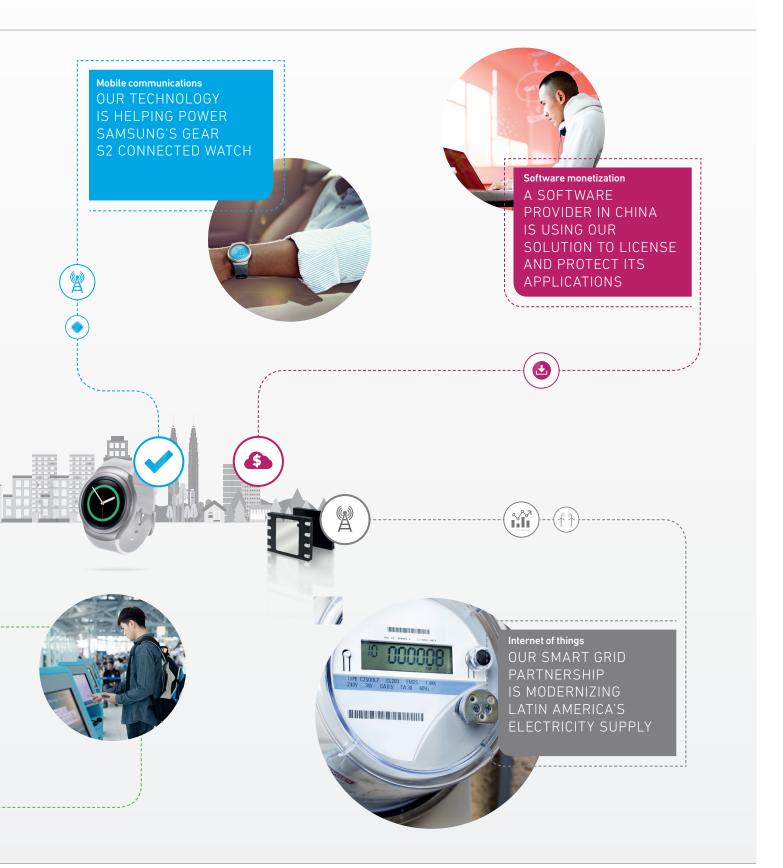
Our clients are based in over 180 countries – so our global presence is a vital asset. We can share our international experience locally, provide solutions adapted to specific conditions and be on hand to offer a personalized service.



Our markets and solutions

We serve customers in six main markets enabling our clients to deliver a vast range of secure services based on two core technologies: **authentication** and **protection**. These include mobile identity, payment, online banking, cloud access, transport ticketing, e-Government, vehicle telematics and software monetization.





Protecting identities and data, anywhere

Trust in a connected world Security that satisfies the toughest regulators NASDAQ OMX pioneered electronic exchanges and continues to be a leading innovator in technology for financial markets. It owns and operates 23 markets and its technology now drives over 70 exchanges in 50 countries. To reduce its own IT costs, it developed a cloud-based platform meeting the stringent security requirements of regulators worldwide. This proved so successful that NASDAQ has created a similar cloud platform for its customers. Using Gemalto Hardware Security Modules, it's been audited and verified to meet a host of regulatory security policies and compliance mandates.

In today's connected society, organizations and their customers benefit from services that can be accessed anywhere, from any device, at any time.

The result: a soaring quantity of precious data and identities to protect. As the incidence of high-profile data breaches grows, our strong identity and data protection solutions enable our customers to protect what matters, where it matters – from the edge to the core of networks, in the cloud, and anywhere in between.

MARKETS

- Large enterprises
- Financial services
- Governments
- Healthcare organizations
- Retailers
- Cloud service providers
- Internet of Things

SERVICES AND SOLUTIONS

- Strong user authentication and trusted identities
- Encryption for data at rest and in motion
- Centralized key management
- Cloud and virtualization security
- Security for digital banking, payments and transactions
- Data and identity security for the Internet of Things

What we do

Gemalto's SafeNet solutions ensure the security of identities and data, and their communication between organizations and people as well as devices in the fast-expanding Internet of Things. We protect and control access to sensitive information, secure data in virtual and cloud environments, safeguard transactions, manage risk and ensure compliance.

We ensure secure, simple access

Our easy-to-use multi-factor authentication solutions provide secure access to corporate networks and applications, and protect and validate the identities of users. Governments and many of the largest companies trust us to secure mission-critical information, control access, protect identities, ensure data ownership and safeguard communications.

We ensure trust in the cloud

Our authentication, encryption and key management solutions for the enterprise cloud create trusted, compliant environments by solving the key challenges of data governance, control and ownership. We also enable cloud service providers to enhance trust in their services with highly scalable and easy to deploy authentication- and encryption-asaservice offerings.

We protect data from interception and theft

Our data-centric encryption provides persistent protection of sensitive data whether at rest or in motion. From physical to virtual data centers, our solutions keep organizations protected, compliant and in control with encryption and key management products that secure sensitive data wherever it is. Our hardware security modules protect the cryptographic infrastructure of some of the world's most security-conscious organizations, providing robust encryption, decryption, authentication and digital signing services for a wide range of applications.

We secure digital banking, payments and transactions

Companies offering financial and retail services are under increasing pressure to ensure the integrity and security of sensitive data, payments, online purchases and transactions. Our data encryption and protection helps them secure sensitive financial information across the entire payment ecosystem, from point-of-sale to bank. Our encryption and key management solutions provide transaction validation and signing, key storage and secure communication for over 80% of the world's fund transfers with a value of more than \$1 trillion every day.



Securing **smarter, digital banking** and payment

Ш Trust in a connected world Securing mobile banking in the Philippines When over 90% of Filipinos said they wanted to "take their banking with them", BancNet* decided to deliver. Now, its 40 million banking cardholders can pay their bills, check account balances and transfer funds using their computers, tablets and other mobile devices. Securing the service is Gemalto's Ezio solution, enabling them to perform dynamic, multi-layer authentication and verification of their transactions. BancNet is a Philippines-based network of 116 local and international banks

Gemalto has been supporting banks and financial institutions for 30 years.

Our technology helps them to keep pace with innovation, create new revenue lines, streamline performance and engage better with customers. Today, retailers and transport operators also depend on our secure solutions for mobile and contactless payment. For all these customers, the robust security and convenience we provide ensures end-users' confidence in their services.

MARKETS

- Financial institutions
- Banks
- Retailers
- Payment/loyalty card issuers
- Mass transit authorities
- Transport operators

SOLUTIONS

- Secure operating systems and applications for contact and contactless payment
- Mobile financial solutions and services
- Strong authentication and transaction signing for online banking and eCommerce
- Contactless eTicketing for public transport
- NFC payment and ticketing
- Marketing services
- ID verification solutions



What we do

Increasingly, people want to conduct their banking and payments digitally – by card, on mobile, online and on-the-go. So financial institutions are transforming their services using digital channels: in the US alone, retail banks spent some \$16 billion on digital programs in 2015¹. Gemalto's innovative, tailor-made solutions support a wide variety of channels, formfactors and standards for the wallet, internet and mobile. We provide a complete service from consultancy and authentication servers to design, production, personalization, integration and hosted authentication, distribution and fulfillment.

Cards, contactless and NFC

We support a wide range of card programs worldwide using the EMV (Europay, MasterCard, Visa) standard for chip-based credit and debit cards, as well as advanced authentication (DDA2) systems and loyalty schemes. We also support next-generation dual-interface contactless devices and ensure the security of many of the world's mobile payment solutions. And as a Trusted Service Manager we enable banks, mobile network operators and other service providers to deploy secure and seamless Near-Field Communication (NFC) solutions.

eBanking and eCommerce

Online banking is fast becoming the norm. By reinforcing their eBanking offer across all channels, our clients increase customer loyalty and usage and arm themselves against competitors. Our strong authentication and transaction-signing solutions provide secure access to home and mobile banking services, retail and corporate bank networks and eCommerce sites.

Transport

Transport authorities use digital ticketing to increase passenger flows, protect revenue, cut costs and develop new revenue streams. As the world's number one smart card provider² we've rolled out 200 million cards worldwide, including contactless travel programs for more than 30 cities with million-plus populations. Our comprehensive service runs from back office management to personalized cards, and our Trusted Service Hub makes service deployments fast and secure. We're also the only supplier that can quickly and easily implement a complete NFC solution.

¹ Source: IDC Financial Insight ² Source: ABI Research

Leading the modernization of ID and access to public services



eGovernment helps public authorities improve their services for citizens while making productivity gains. Gemalto is a leading player in this field, with over 100 programs worldwide based on our unique experience in strong identity solutions. Innovation is a key part of our offer, helping governments to modernize public services and deliver significant benefits to society.

MARKETS

- Governments
- Border authorities
- Healthcare and health
 insurance providers
- National printers

SOLUTIONS

- Secure eDocuments and digital identity solutions
- End-to-end citizen ID solutions from enrollment to production and issuance
- National eGovernment secure infrastructure
- Border and visa management solutions
- Mobile ID solutions



What we do

Governments are modernizing documents to enhance security, combat document and social fraud, and improve services. Gemalto is the world leader¹ in supplying government and healthcare eDocuments and associated services.

Electronic passports

In 2013, 25% of the world's passports were electronic. By 2017 the share will be over 50%, and 2.7 billion other eDocuments will be in circulation – including drivers' licenses and ID, health and voter cards. We deliver ePassport programs in over 30 countries, providing not only documents but also software and services.

IDs and document verification

We support national ID programs for over 45 countries – joined by Uruguay and Singapore in 2015. In North America, where the default ID is the driver's license (DL), many states are starting to modernize these documents to fight fraud. In 2015 we delivered Quebec's first new DL cards and Maryland selected our new polycarbonate DL. California began offering DLs to undocumented immigrants, using our advanced software to verify passports, ID cards and DLs from a variety of issuing countries. We recently launched an innovative mobile authentication solution enabling citizens to access online government services using a contactless national eID card and an NFC phone.

Voter registration

In 2015, Guinea became the seventh African country for whom we've created a modern voter register to underpin democratic elections. Millions of voters were enrolled accurately and reliably ahead of the elections in October last year.

Border and visa management

Converging technologies are enabling governments and border agencies to implement consistent, comprehensive border control, visa management and document verification. Since July 2015, travelers to Gabon in Central Africa have been able to obtain visas online – the latest development in the country's eGovernment program to make public services more accessible.

¹ Source: ABI Research

Bringing **security and intelligence** to connected devices



The Internet of Things (IoT) is transforming the way we live and work, with manufacturers of consumer devices and industrial equipment building a vast ecosystem of smart, connected objects. The security of devices, networks and the cloud is critical to its efficient and safe operation. It's also vital for public acceptance, as shown by high-profile hacks in automotive and other sectors.

MARKETS

- Integrators
- Mobile network operators
- Service providers
- Consumer electronics and OEMs
- Car manufacturers
- Metering suppliers
- Healthcare service suppliers
- Security systems and many more

SOLUTIONS

- Secure elements and embedded SIMs
- Machine Identification Modules™ (MIMs) and wireless Machine to Machine (M2M) modules
- M2M application enablement and delivery
- On-demand connectivity platforms for subscription, application and device management
- Trusted Service Hub
- Professional services: design-in support, pre-certification testing and security consulting
- Cloud encryption and authentication
- Software protection, entitlement and monetization

What we do

Gemalto enables the IoT to deliver its promise. We give users confidence that their connected devices are secure and their privacy is guaranteed. We keep data secure – on the device, through the network to the cloud and beyond. And we keep connected devices updated with the latest software for optimum performance as well as combating malicious threats.

As technology leaders, we create opportunities for innovation by device manufacturers and service providers. Our On-Demand Connectivity brings instant mobile data to a wide variety of new devices, enabling manufacturers and operators to offer seamless and flexible remote provisioning and mobile subscription management. We are the first to offer LTE Category 1 compatibility, providing future-proofed connectivity optimized for M2M communication. And our technology for software-defined machines enables operators to offer pay-by-use or license additional feature sets remotely, while protecting their code from piracy.

Consumer electronics

The booming market for smart wearables and connected consumer electronics devices is creating strong demand for our embedded SIMs and secure elements. With our On-Demand Connectivity and Trusted Services Hub, devices can seamlessly join the right network and host an array of value-added applications in payment, transport, access and more. In maturing markets such as tablets, PCs and smartphones, manufacturers need new features and services to differentiate their products from intensifying competition. Our security, NFC and cellular subscription management solutions bring added value to end users and enable features tailored to specific markets such as the enterprise segment.

Industrial applications

Our M2M modules and MIMs, designed for years of reliable service even in hostile environments, are used across a growing range of sectors. Automotive customers rely on us to secure LTE high-speed mobile connections bringing services to drivers while meeting new international vehicle safety regulations. We enable medical monitoring devices to send data to clinicians anywhere in the world, helping to enhance care, save time and lower costs. In logistics, our technology is used to track, trace and monitor assets and fleets – helping to safeguard against theft, avoid spoilage in the cold chain and optimize routes to reduce fuel costs. And we help energy utilities to match supply and demand by enabling security and access for remote meters and distribution points.

INTERNET CONNECTED DEVICES PER HOUSEHOLD IN 2020 (FROM 10 TODAY) OECD

Enabling trusted **on-the-go** services

Trust in a connected world Faster commuting in China

45 million people in China's two largest cities, Shanghai and Beijing, use public transport systems every day. For speed and convenience, China Telecom* is deploying Gemalto's NFC solution so commuters can ride metros and pay for everyday purchases with a simple tap of their smartphones. The LTE SIMs also enable users to benefit from other NFC services, leading to a wider adoption of mobile contactless technology across the entire country.

* China Telecom is a leading operator in the country with more than 183 million subscribers.

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The mobile channel has created a vast range of new opportunities – from payment to eGovernment services and secure cloud access for enterprises. Innovative consumer services are also proliferating, while the Internet of Things is bringing connected intelligence to billions of industrial and consumer devices. We give subscribers and operators the confidence that they can trust these services, by providing secure,

value added solutions in devices, the cloud and across the network.

MARKETS

- Mobile network operators
- Financial institutions
- Governments
- Consumer brands
- Retailers
- Transport authorities and integrators

SOLUTIONS

- **Inside devices:** software, operating systems and apps embedded in multi-tenant secure elements to authenticate users and protect data
- **On networks:** client-server platforms for mobile commerce, on-demand connectivity and activation, device management, mobile protection, mobile marketing, messaging and operator billing, cloud encryption and authentication
- Identity and security: supporting operators, governments and service providers with secure ID, authentication and access services



What we do

Some 450 of the world's mobile operators work with Gemalto. And they're being joined by growing numbers of other businesses who are adding mobile services to their offering. We enable them to deploy services quickly, securely and cost-effectively – providing trust at key points in the mobile chain and a platform on which to build innovative business models while ensuring customer convenience.

NFC and mCommerce

We are helping more and more operators, banks, transport operators and device manufacturers to offer their consumers the power and convenience of mobile contactless services. Our Trusted Services Hub infrastructure enables rapid deployment of payment, loyalty, transport ticketing and other contactless services for any security architecture from tokenization for Host Card Emulation to hardware approaches with secure elements. We also help design and deploy effective permission-based mobile messaging and marketing campaigns: Gemalto's Netsize is a world leader in mobile operator micro-payment solutions and messaging services. And we offer a unique, extensive footprint for operator billing as a convenient payment channel for digital goods, vending and ticketing. Crucially, we fight online purchase fraud with our mobile dynamic code verification solution.

Networks and connectivity

We enable operators to optimize their networks, speed-up deployments and monetize services. We help them minimize customer acquisition costs through real-time SIM activation, and remotely manage devices throughout their lifecycle. Our on-demand subscription management solution provides instant, flexible mobile connectivity for machine-tomachine and consumer devices. And with Advanced Connectivity, we offer Over-the-Air activation, personalization and optimization of services on any scale. We also offer innovative solutions for rapid app distribution, for ensuring best customer experience and service quality, and for reducing data traffic saturation through Wi-Fi off-load services.

Identity and security services

With our Mobile ID solutions we enable operators, governments, online service providers and others to offer their users secure ID, authentication and access services. Our Mobile Connect-compliant solution provides secure web access, transaction validation and digital signatures. We also offer solutions to protect corporate data in the cloud and turn bank customers' mobiles into strong second-factor authentication devices for digital banking.

Protecting software, boosting revenues and enhancing the **customer experience**

Trust in a connected world Simplifying enterprise license management



HP provides a vast portfolio of solutions for large enterprises including best-in-class components that simplify IT. They needed an efficient, user-friendly way of managing disparate license generators, a huge catalog and thousands of product activations daily. So for their customer portal they chose Sentinel EMS, a flexible web-based solution that enables them to manage their 4 million entitlement records, as well as license activation, cloud licensing, advanced usage data collection and reporting.

The way software is consumed, priced and delivered is continuously evolving.

Subscription models are booming, with software companies' subscription revenues growing over five times faster than license sales¹. Gemalto's Sentinel Software Monetization solutions help technology companies secure their intellectual property and maximize the uptake and profitability of their software offerings.

MARKETS

- Independent software vendors
- Hardware and device manufacturers
- Cloud and Software as a Service (SaaS) providers
- Internet of Things

SOLUTIONS

- Software protection and licensing
- Entitlement management and usage tracking
- Embedded software licensing
- Software monetization professional services
- SaaS monetization

OF THE TOP 100 SOFTWARE VENDORS NOW EARN SUBSCRIPTION REVENUES IDC 2015

What we do

Our Sentinel Software Monetization portfolio helps technology companies protect, manage and monetize their business software – whether it is in the cloud, embedded in hardware, or installed on premise.

Our solutions address each and every aspect of the software monetization life-cycle – from copy and intellectual property protection to business model flexibility; and from tracking ongoing usage to improving the end-user experience.

Sentinel is the only complete portfolio of software licensing and entitlement management solutions to enable monetization of any type of software using any combination of software delivery models to any enduser device.

Software protection and licensing

Our award-winning suite of hardware, software and cloud based licensing solutions are designed to prevent unauthorized use and distribution of software products. They also enable tracking of detailed usage data – while protecting intellectual property from tampering and reverse engineering.

Entitlement management

We make licensing management simple. Our flexible, feature-rich solutions ensure entitlement generation, tracking and ongoing management are quick and easy for both software publishers and their end-users, reducing costs and improving the customer experience.

SaaS monetization

Our Sentinel Cloud offering is the industry's first and only cloud-based licensing solution. This lets technology providers define, provision, control and track versatile cloud-based services right down to the feature level. End-users benefit from flexible access to applications while vendors gain new cross and up-selling opportunities.

Embedded software licensing

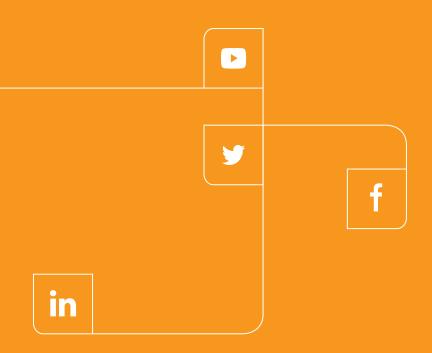
The value of hardware continues to shift from the physical components to the software running the device. Our embedded software monetization solutions give intelligent device manufacturers the tools to protect their products against tampering and reverse engineering while also opening up an entirely new world of packaging and licensing opportunities to maximize profitability. The combination of our embedded software and SaaS monetization expertise adds a new dimension of protection and revenue opportunities for companies looking to profit from the Internet of Things.

¹ Source: IDC 2015, top 200 software companies

Inspired to know more?

If you'd like to know more, we'd be pleased to hear from you. And with employees of 117 nationalities in 49 countries around the world, we're probably close by and speak your language.

You can find full details at **www.gemalto.com** or on these social networks:



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