

# ERICSSON ENTERPRISE MOBILITY GATEWAY

Communications Powered Up



At today's companies, employees are increasingly mobile—some just in the areas around their desks, some within the office or factory and others over a wider area. Different people and different jobs have different requirements regarding communications solutions. No matter where you are or who you are, communications is a critical factor for your performance.

Wireless access, allowing you to move around and still be able to call and be called, is a fundamental element of mobility. However, supporting mobility requires much more than just wireless access. You also need application services, support and flexibility—always being part of the enterprise communications infrastructure and its policies.

Ericsson's Enterprise Mobility Gateway enables enterprises to expand their mobility needs while keeping control over usage and cost levels, and at the same time, provides integrated business class voice and application services to the mobile workforce.

The Enterprise Mobility Gateway is also the foundation of the Ericsson One Phone Concept,

which embodies fixed-mobile convergence for both voice and data services. One Phone enables desktop and mobile phones to seamlessly integrate into corporate communications and IT systems. For an enterprise, this provides an excellent means of fully capitalizing on the power of mobility for enhanced employee efficiency and at the same time gaining complete control over communications services. Regardless of location, users can have full access to telephony services such as conferencing, dynamic mobile least cost routing, call transfer, hunt groups and attendant services, as well as data services such as corporate directory access, presence management, mobile e-mail, contacts and calendar updates. The solution is based on real and dynamic employee needs so that enterprises truly rise to new heights of achievement.

## Using Mobile Phones as Extensions to Corporate Communications Networks

Mobile users in the Enterprise Mobility Gateway are treated the same as standard network extensions/trunks in a traditional communications system PBX. All traffic to and from mobile phone users passes

through the gateway server, allowing the system to link corporate services to these calls. Multiple phone numbers/extensions can be associated with a user One phone identity, and at the same time, also map the relevant class of services.

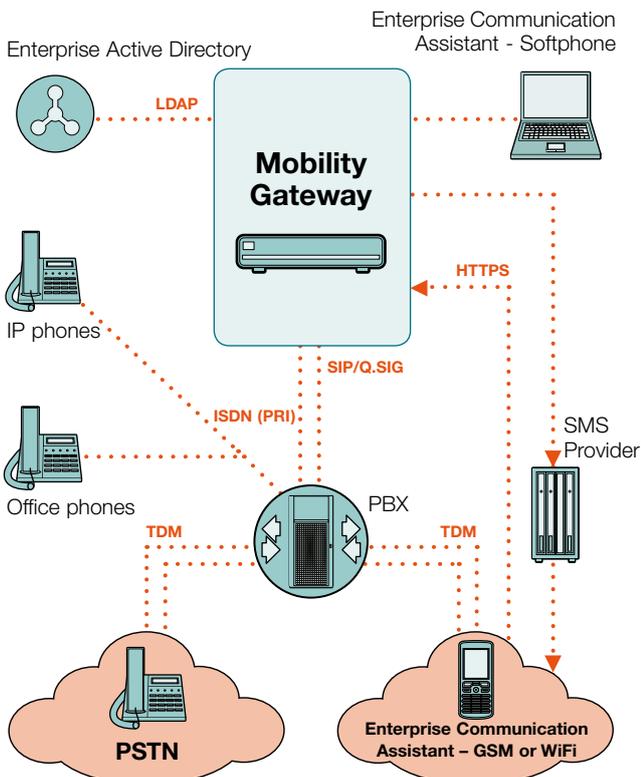
Within a corporate communications system, a mobile phone user will appear the same as any other user. This means that all normal corporate PBX services are applicable, and other users do not need to know that they are calling a mobile phone.

In addition to using mobile phones, users can easily move their One Phone identities to any other pre-registered phone, maintaining the full set of services.

Different terminals and services/agreements (from telecom operators) provide different solutions and benefits to users. Using standard mobile/fixed operator services with the solution can provide excellent usability and control; however, by adding enhanced operator agreements, complemented with the right phones and applications, there are opportunities to achieve even better usability and to utilize private networks and low-cost trunks in more cost-efficient ways.

## Solution overview

The figure below describes a basic deployment of the Enterprise Mobility Gateway solution in an enterprise environment and its adjacent network.



## General

The Enterprise Mobility Gateway consists of a server platform and software components that are used to build a complete mobility based communications solution for an enterprise:

- Enterprise Mobility Gateway including Mobility Server.
- Enterprise Communication Assistant - Softphone
- Enterprise Communication Assistant - Mobile

The system initially provides mobile voice and corporate directory/presence-based services, fully integrated with the corporate communications network, on 2G/3G mobile devices as well as dual-mode mobile/WiFi devices.

The Ericsson Enterprise Mobility Gateway is offered as a gateway solution that can integrate mobile phones and PC-based soft clients (two essential components of mobility) with a company's existing communications infrastructure. The Enterprise Mobility Gateway connects to an existing IP PBX using the SIP, Q.SIG or E1/T1 interface, and through these interfaces it is able to offer most existing PBX services on the mobile phone or PC softphone using a software client.

The basic Enterprise Mobility Gateway system can be extended with additional gateways or interface modules.

## Key Features

**Single Number reach (One Phone)** Use a mobile phone, conventional desktop phone or voice-over-IP phone connected to the PBX just like any other office extension. Single number reach allows users to be available on all devices at a single phone number, in sequence or parallel.

**Personal call routing** Personal call routing can be used to manage incoming and outgoing calls. Incoming calls can be routed to any user device, switchboard or voice mailbox based on, for example, time and date, day of the week, user activity and role, calling party identity and caller priority.

**Dynamic mobile LCR (Least Cost routing)** The dynamic mobile LCR feature minimizes mobile roaming expenses by having call setup routed through the least costly path. The logic is based on current call tariffs managed in the Enterprise Mobility Gateway. By using call tariffs, the Enterprise Mobility Gateway determines the most cost-efficient break-out for each call. It also generates dial plans that are distributed to mobile phones running the mobile client.

The Dynamic Mobile LCR feature applies to all calls set up through the system, also allowing savings for international calls from conventional and VoIP phones.

The feature is transparent for end-users using the mobile client and works from any mobile network.

**High availability** – The Ericsson Enterprise Mobility Gateway offers high availability by using redundant hardware with automatic failover (hot standby).

**Presence service** The presence information in mobile and softphone clients allows users to see the status and availability of colleagues. The presence format includes information such as user role, activity and device status.

**Call recording** The system offers a call recording service to allow users to initiate recordings of calls when using mobile and softphone clients.

**OTA (Over the Air Configuration)** The system offers complete OTA provisioning of mobile clients. Installation, configuration and updates can be conducted automatically using standard SMS texting.

**PBX soft buttons:** This feature extends PBX features such as call conferencing, hold and transfer to the Enterprise Communication Assistant - Softphone and the Enterprise Communication Assistant - Mobile clients. These features are available to users as soft buttons, which are easy to access and use.

**Corporate directory access:** The Enterprise Communication Assistant Mobile & Softphone allows full access to the enterprise Active Directory, making it easy to search for colleagues from any device.

**Dual Mode with WiFi for on-premises calling** With the dynamic mobile LCR, WiFi can be chosen for on-premises calling.

## Benefits

A smoothly running mobile solution creates instant accessibility to vital skills and resources throughout

an enterprise. It reduces communications costs with an optimized infrastructure and increases customer satisfaction based on simplified communications structures, in other words, you reach people on the first try.

Customers seeking fixed or mobile IP solutions can find a solution to grow by using the Ericsson Enterprise Mobility Gateway. The system enables enterprises to smoothly migrate towards converged mobile and IP infrastructures. By adding new IP-based functional modules in a step-wise approach, fast and safe rollout is achieved. With the modular approach, the flexibility and the strategic fit, Enterprise Mobility Gateway secures and maintains long-term investments in communications infrastructures.

This approach offers a variety of cost-efficient functions when using Ericsson Mobile Extensions (control of mobile phone costs and added telephony functionality for mobile workers, eliminated costs for moves and changes). Additionally, the Linux-based server approach, combined with the 19-inch design standard, provides good fit and easy integration into existing IT environments.

## Increased Productivity

- Seamless mobility with one user, one identity, one number, regardless of the terminal
- Increased individual responsiveness with reduced response times to events and customers
- External parties can be easily integrated with the enterprise communication infrastructure on a temporary basis without risk or expense to the enterprise.
- Employees can more or less work anywhere and still be fully supported by the enterprise communications system and corporate policies.
- Allows for branch office integration with Mobile Extensions giving same look, feel and functionality as main office, but with no local system to maintain.



## Capacity

CAPACITY OF Enterprise Mobility Gateway System	Minimum configuration	Maximum per server
Number of users	10	500
Number of digital ports (T1/E1/Q.sig) (master GW)	0	3
Expansion gateway (T1/E1/Q.sig)	0	4
SIP trunk (number of remote systems)	0	10

## Technical Data

DIMENSIONS	
Telephony Server	19" x 1 U
Media Gateway	19" x 1 U
POWER	
Supply Voltage and Power Consumption	100–240 V AC, 50 - 60 Hz; 1 A max
INTERFACES (ENTERPRISE MOBILITY GATEWAY )	
LAN/WAN	1 fast Ethernet 10/100 Mbps
Supported standards	SIP: (main) RFC3261, 3325, 3515, 3892, 3550, 3263, 3264 HTTP, HTTPS
Supported voice codecs	Softphone: G.711 a-law and u-law, GIPS iSAC, eG711 and iPCMwb Desk phone, gateway and media server: G.711 a-law and u-law, G.729
FUNCTIONALITY	
Call accounting	Integrated report tool
Compatibility	At the time of this release, Ericsson has tested interoperability with the following PBXs: Cisco Call Manager 5.1, Mitel IP communication platform, MX-ONE 3.1. Ericsson is continuing testing of interoperability with other PBX solutions.
System management	Integrated Web provisioning
APPLICATIONS	
User-related applications	<ul style="list-style-type: none"> <li>Enterprise Communication Assistant – Softphone</li> <li>Enterprise Communication Assistant – Mobile</li> <li>Enterprise Communication Assistant – Web</li> </ul>

### Existing PBX features that can be provided to mobile users when connected via Q.SIG:

- Basic call
- Number presentation, calling and connected
- Number presentation restriction, calling and connected
- Single step call transfer
- Call forwarding, from PBX to EMGW
- Diversion information, from PBX to EMGW
- Rerouting Information, from PBX to EMGW

Dependent on Q.SIG PBX implementation on foreign PBX

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