



## SafeMove® for Nokia Smartphones Business on the move

Did you want to hop in a cab from that coffee house HotSpot and ride to the airport without breaking your application connections to the enterprise home office? With Birdstep SafeMove on your Nokia Smartphone, you can.

### FULL SECURE ACCESS TO CORPORATE NETWORK

SafeMove for Nokia Smartphones is an innovative software-based solution for connecting mobile devices securely to corporate networks. The software enables seamless roaming between cellular and WLAN networks choosing automatically the best network available. All data communications are encrypted and all users are authenticated from the user devices to the enterprise network.

### BETTER PRODUCTIVITY

By providing seamless and secure roaming, SafeMove for Nokia Smartphones is able to reliably deliver breakthrough services to mobile users including VoIP, streamed video, (push)email, calendar and access to shared data services. The user has always the best available connection in use that does not break even when changing link media, for example from WLAN to 3G to GPRS. More efficient operations free resources for effective working and automatic utilisation of WLAN networks significantly reduces costs of data communications, especially international roaming fees.

### EASY MANAGEMENT

SafeMove-client for Nokia Smartphones connects to SafeMove server, a high-performance, scalable solution for the central office. SafeMove server provides single server infrastructure to all mobile workers of an organisation regardless if they are laptop or smartphone users. Deployment and remote wireless management of SafeMove clients in Nokia Smartphones can be done by using OMA Device Management. SafeMove enterprise mobility solution is based on standard technologies such as IPsec, Mobile IP and PKI.



# Technical specifications (SafeMove version 4.2.4)

## COMPONENTS

Birdstep SafeMove client (Mobile IP)  
Birdstep SafeMove server (Mobile IP Home Agent, IPsec Gateway)  
Birdstep SafeMove Manager  
Nokia mVPN client  
OMA Device Management

## SUPPORTED PLATFORMS

### Client

Nokia E51  
Nokia E63  
Nokia E66  
Nokia E71  
Nokia E90

### Server

RedHat Enterprise Linux 4 and CentOS4

## HIGH AVAILABILITY AND LOAD BALANCING

Server-side support for stateful high availability and load balancing.

## WIRELESS AND CELLULAR NETWORKS

Support for WLAN, HSDPA, UMTS, EDGE, GPRS

## MANAGEMENT

OMA Device Management

## SUPPORTED AUTHENTICATION STANDARDS

X.509v3 certificate format  
PKCS#12 interface for importing private keys and certificates

## SUPPORTED VPN STANDARDS INCLUDE eg.

RFC2401	Security Architecture for the Internet Protocol
RFC2406	IP Encapsulating Security Payload (ESP)
RFC2407	The Internet IP Security Domain of Interpretation for ISAKMP
RFC2408	Internet Security Association and Key Management Protocol (ISAKMP)
RFC2409	The Internet Key Exchange (IKE)
RFC2631	Diffie-Hellman Key Agreement Method
RFC3947	Negotiation of NAT-Traversal in the IKE
RFC3948	UDP Encapsulation of IPsec ESP Packets

## SUPPORTED MOBILITY STANDARDS

RFC2003	IP Encapsulation within IP (IPIP)
RFC2794	Mobile IP Network Access Identifier Extension for IPv4
RFC3024	Reverse Tunneling for Mobile IP
RFC3115	Mobile IP Vendor/Organization-Specific Extensions
RFC3344	IP Mobility Support
RFC3519	Mobile IP NAT/NAPT Traversal using UDP Tunneling
RFC3543	Registration Revocation in Mobile IPv4
RFC4433	Mobile IPv4 Dynamic Home Agent Assignment
RFC4917	Mobile IPv4 Message String Extension

## NAT TRAVERSAL

NAT Traversal enables smooth mobility between networks behind a network address translation (NAT) gateway. This is needed when visiting networks behind certain firewalls, certain hotspots and cellular networks.

## SECURITY PROTOCOL FRAMEWORK

IPsec/IKE

## USER AUTHENTICATION METHODS

Software certificates

## IKE

### Authentication methods

RSA signature, DSA signature

### Exchanges

Main, Quick

## IPsec

### Modes

Tunnel

### Protocols

ESP

### Hash algorithms

SHA1

### Encryption algorithms

AES, Triple DES