STARHOME MACH SOLUTIONS

LTE ACCELERATOR

Increase inbound data roaming traffic by offering LTE services without LTE agreements

ACTIVE ROAMING ANTI-FRAUD

Protect roaming revenues with fraud detection and reaction in real time

SILENT ROAMERS

Gain new revenue streams by identifying and encouraging silent and low-usage segments

360⁰ WHOLESALE MANAGEMENT

Improve wholesale business decisions with actionable analytics in real time

Starhome Mach drives mobility forward, adding value through enabling technologies for global and cloud connectivity. We are situated within and between 300 operators in over 130 countries.

We remove boundaries, giving subscribers the freedom to roam across network technologies and geographies.

For operators, our solutions provide one place to manage the wholesale and retail inter-carrier business while deriving more value from underlying networks. We link operators and applications to create truly global mobile applications.

The company has three main offices in Switzerland, Luxembourg and India. It also has a worldwide network of support locations providing local support and professional services.

WWW.STARHOMEMACH.COM

ACTIVE ROAMING ANTI-FRAUD

Protect roaming revenues with fraud detection and reaction in real time

MAIN OFFICES

Switzerland
Global Headquarters
Seefeldstrasse 25, 8008
Zurich, Switzerland
T +41 44 380 6777

Luxemburg
Airport Center
5 Heienhaff
L-1736 Senningerberg
Luxembourg
T +352 27 775 100

India
49, 3rd Floor, Shilpa Vidya
1st Main Road, Sarakki
Industrial Layout, 3rd
Phase, J P Nagar
Bangalore-560 078
India
T +91 80 669 09400

STARHOME MACH

STARHOME MACH

MARKET SCENARIO

Detecting and preventing roaming fraud is one of the biggest challenges faced by mobile operators today. Roaming fraud was highlighted as one of the largest types of fraud along with International Revenue Share Fraud (IRSF), in a survey carried out by the CFCA* in 2013. Global fraud loss estimates for 2013 were approximately 2% of telecom revenues. On average, 17% of operator fraud types are reported as roaming fraud and IRSF*.

While the majority of operators now utilize NRTRDE to minimize reaction time to roaming fraud and IRSF, there are still gaps in the response time. Fraud Management systems generally lack information on fraudulent global numbering plans, and are not able to act on suspicious call behavior in real time.

$6.11B
Roaming Fraud

$1.8B
International Revenue
Share Fraud

*Source: CFCA – Communications Fraud Control Association 2013 Global Fraud Loss Survey

OPERATOR NEEDS

The inability to tackle issues such as fraudulent numbers and premium rate destinations within the Fraud Management System (FMS) has resulted in many operators barring destinations and number ranges to minimize the risk of fraud. Massive blocking action is a 'one size fits all' solution that can have a negative impact on revenue and customer satisfaction.

To effectively tackle roaming fraud, operators need a real-time solution that can work in conjunction with their existing FMS. A solution that includes an updated global database to not only detect fraud cases but also to prevent ongoing fraud is critical to protect loss of revenue.

THE STARHOME MACH SOLUTION

Active Roaming Anti-Fraud provides operators with a new level of protection against fraud by incorporating real-time call tracking with the adjustment of users' roaming profiles based dynamically on incoming evidence. Fraudulent and premium numbers are maintained globally; barring or blocking is implemented without impacting core network elements.

This complete solution identifies and acts on roaming fraud and IRSF cases in real time. The solution can bar users as well as calls. It can standalone as a CAMEL solution and can also be deployed to cover all scenarios with integrated NRTRDE. It acts on emerging risks using risk profiles defined by the operator, barring destinations, calls, and users as appropriate. This prevents the traditional delay between fraud detection and consequent action, and is achieved in four basic steps:

- **Planning** - detects abnormal behavior and manages global fraudulent hotspots (includes IRSF, premium numbers) for anti-fraud activities using a cross-information dashboard.
- **Execution** - real-time alerts and automatic blocking or barring mechanisms to prevent fraud activities.
- **Tracking** - subscriber profiling based on individual expected behavior and fraud cases, prioritized according to business impact.
- **Analysis** - roaming fraud wholesale effects, case drilldown tools and summary reports.

BUSINESS BENEFITS

Minimizes roaming fraud risks for inbound and outbound	Identifies abnormal activities and their business impact	Increases customer satisfaction by ensuring legitimate calls
Minimizes fraud with real-time actionable analytics	Provides information on suspicious destinations	Eliminates fraud-related disputes with roaming partners

SHARED MODULES

The following products enhance the capabilities and benefits of the Active Roaming Anti-Fraud solution to better meet each operator's goals and action plans.

Unity
Business
Management

Roaming Anti-Fraud
Detects and prevents fraud for outbound and inbound roaming in real time

Subscriber Level Analysis
Advanced reports to analyze and detect abnormal behavior

NRTRDE
Monitors and identifies usage in near-real time

Traffic Performance Management
Analyzes the business impact of fraud activities