

## Overview

MACH7-SS7 Stack provides a high performance and scalable Signaling System No. 7 (SS7) solution for network equipment manufacturers and OEMs' with requirements for connecting to Intelligent Networks or SS7. Designed for flexible and scalable solution on multiple links, MACH7-SS7 Stack will meet and exceed requirements of today's evolving telecommunication marketplace.

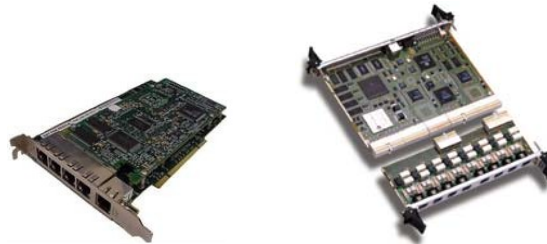
## Benefits

- **Efficient Solution**

Upper layers of the SS7 protocol (MTP3, SCCP, TCAP, ISUP) operate in a Solaris / Linux environment with a set of industry-standard C/C++ API. The Stack provides increased flexibility and scalability as the higher layers runs on host computing environment. At the same time it reduces the processing overload of the lower layers MTP1 and MTP2 from the host environment to the board level.

- **Ease-of-Use**

teleSys provides a well-documented suite of API's for MTP3, SCCP, TCAP, ISUP, INAP, AIN, MAP (GSM & IS41), CAP and WIN with sample application source; also available is a Web-based GUI to provision and monitor the stack.



- **Market-Leading Support**

All of our products are fully supported; in addition, we offer premium "24x7" support with guaranteed service levels to our clients.

- **Leading edge Professional Services**

A business relationship with teleSys can provide opportunities for evaluation and professional services to implement and integrate teleSys solutions to meet the client's need.

- **Well Proven Solution**

teleSys customers around the world are using the MACH7-SS7 for implementation of wide range of applications and services. Network elements currently in place or under development include: service control point, intelligent peripheral, service node, service switching point, network switch feature adjunct, HLR, short message service and several others. For efficiency and flexibility, the MACH7-SS7 is an intelligence choice.

## Options

- Operating Environment : Solaris or Linux.
- Application environment : Solaris, Linux, Windows.
- API packages for MTP3, SCCP, ISUP, TCAP, INAP, AIN, MAP (GSM & IS41), CAP and WIN.
- PCI or cPCI form factor for the SS7 interface.
- T1/E1/J1 or V.35 interface.
- Variant standards: ANSI, ITUT, NTT Japan, TTC Japan, ETSI and other country specific variants.
- Number of SS7 links which varies from 2 to 32 links per card.

# MACH7-SS7 Stack

## Features

### User Application Programming Interface (API)

C/C++ based MACH7-SS7 Stack API (Application Programming Interface) is available on various operating environments like Solaris, Linux, Windows 2000 or NT, and QNX. The API packages also provide sample application source code for ease of understanding to the application developers to develop their applications with MACH7-SS7 Stack efficiently and effectively. API packages for other operating environments can be provided by teleSys professional services.

### SS7 features

The MACH7 conforms to functions and message protocols as described in ANSI, ITU-T, ETSI, Japan NTT, Japan TTC along with other country specific variants; supports both Point Code based and Global Title Translation based routing capabilities.

### Multiple High Performance SS7 Links

MACH7-SS7 Stack supports multiple scalable options for SS7 connectivity and provides flexibility to our clients. Options include: T1/E1/J1 for PCI or cPCI systems with Basic or PCR (Preventive Cyclic Re-transmission) error control support. Supported links range from 2 to 32 on a single card. Also supports ATM-HSL interface for greater bandwidth.

### OAM&P

The Platform offers a comprehensive Systems Management interface, which includes: Command Line Interface with options for Web Browser based Graphical User Interface and SNMP Interface to the network management system. It also provides configuration APIs to integrate with the customers' existing element management systems.

### Capacity

Capacity up to 250 TCAP Transactions per second or 100 ISUP Calls per second sustained with 4 links with Single Processor PCI Server. It is scalable to support higher performance by adding more SS7 links and processors.

## Specifications and Standards

### TCAP

ETS 300 287-1 - TCAP version 2, ETSI  
Q.752, Q.771, Q.772, Q.773, Q.774, Q.775, Q.787  
T1.114, ANSI

### ISUP

Q.761, Q.762, Q.763, Q.764, Q.766, Q.730, Q.767  
T1.113 ANSI  
ETS 300 356 - ETSI v2  
JJ-90.10, JT Q.761 ~ Q.764

### SCCP

Q.711, Q.712, Q.713, Q.714, Q.716, Q786  
T1.112 ANSI

### MTP3

Q.701, Q.704, Q.781, Q.791 ITUT  
T1.111.4 – ANSI  
NTT Q 704 – NTT Japan  
JT Q703 – Q 704 – TTC Japan  
China

### MTP2

T1.111.3 - SS7 Signaling Data Link (MTP2), ANSI  
Q.701, Q.781  
NTT Q701-702

### MTP1

Software selectable T1/E1/J1 interfaces to support  
56/64 kbps bandwidth, required for SS7 links.

## teleSys Software, Inc.

*teleSys is the Premier Provider of solutions for the Next Generation Converged Network, delivering open systems software and hardware. The teleSys portfolio of products supports industry standards and all prevalent protocols in Next Generation telecommunication networks.*