mdex SMS messaging platform – Technical Specification
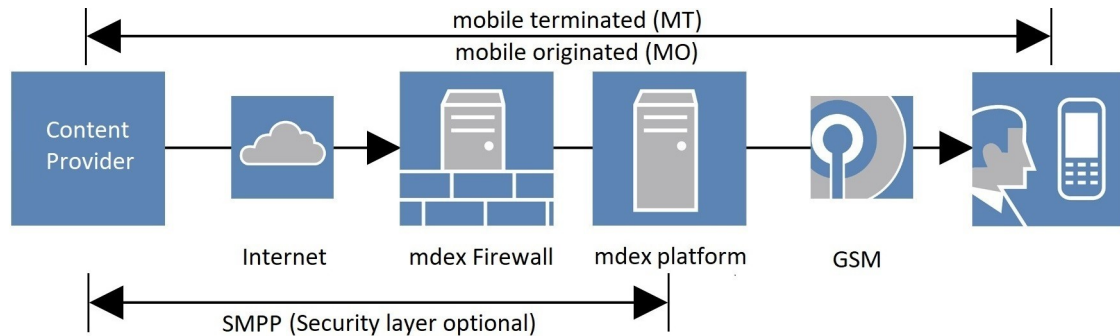## Protocol: SMPP

Overview

The industry standard protocol "SMPP" is used to

- transmit SMS messages to GSM mobile network devices worldwide.
- receive SMS messages from GSM mobile networks national/worldwide (optional).

Standard features

Transmission:	Mobile terminated SMS, (text-messages worldwide and binary content as far as supported by network operators)
Performance:	5 SMS/sec typical performance
Availability:	More than 99% of all cases on an annual base
Client identification:	Client IP address, Customer ID and password
Security layer	≥ TLS1.2 (optional)

Additional optional features

Selected routing:	Selected routing of mobile terminated SMS though hosted large account (LA hosting)
Receiving MO:	Mobile originated SMS with product "SMS Langwahl" or "LA hosting"
Converting:	Converting mobile terminated SMS to different media (Speech, Email, Fax)
DLR:	Delivery reports supported (if feature enabled; Supported protocols for DLR's: EMI/UCP, SMPP or SMTP)

SMPP protocol

Reference version:	SMPP Vers. 3.4 October 1999
Supported operation types:	BIND, UNBIND, SUBMIT_SM, DELIVER_SM, ENQUIRE_LINK without: validity time, deferred delivery
Supported message classes:	0: direct display; 1: ME-specific, e.g. ring tones etc.; 2: SIM specific; 3: TE-specific. See GSM 03.38
User data header	Yes, see GSM 03.40, 9.2.3.23
Sim toolkit	Yes, see GSM 03.40, 9.2.3.9
Supported alphabets:	GSM 03.38 alphabet and 8 bit binary

Process description

The following resources are needed at the customer site:
- Fixed internet access with one or more IP addresses
- Client software for this protocol
- Optional: Security proxy for encryption, e.g. "stunnel" (open source for Linux, Solaris, Windows) or a native TLS implementation in the client software

The following information are needed from the customer:
- Activation sheet for this protocol, including customer name, technical contact, email address for maintenance information and sender IP address(es) of your client

The following information is communicated to the customer:
- Customer ID
- Connection parameters
- Certificates for verification purposes (optional for security layer)
- Access data to customer lounge (optional)
- Target number for mobile originated (MO) SMS (optional)