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Technical Specification

**Digital cellular telecommunications system (Phase 2+);
Location Services (LCS);
Mobile radio interface layer 3 specification
(3GPP TS 04.71 version 8.4.0 Release 1999)**

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Foreword

This Technical Specification (TS) has been produced by the Special Mobile Group (SMG).

The present document defines the coding of information necessary for support of location service operation on the mobile radio interface layer 3 within the digital cellular telecommunications system.

The contents of the present document are subject to continuing work within SMG and T1P1 and may change following formal SMG and T1P1 approval. Should SMG or T1P1 modify the contents of the present document it will then be re-issued with an identifying change of release date and an increase in version number as follows:

Version 8.x.y

where:

- 8 GSM Phase 2+ Release 1999;
- x the second digit is incremented for all other types of changes, i.e. technical enhancements, corrections, updates, etc.;
- y the third digit is incremented when editorial only changes have been incorporated in the specification.

1 Scope

The present document contains the coding of information necessary for support of location service operation on the mobile radio interface layer 3.

Clause 4 defines generic procedures for the control of location services. In clause 5 location service support procedures are defined. Clause 6 gives the functional definitions and contents of messages for location service operations. Clause 7 gives the general format and coding for messages used for location service and the format and coding of information elements used for location service operations between the LMU and MSC. Clause 6 gives the general message format and information elements coding between the LMU and SMLC.

Clause 8 gives the specification of the LMU LCS Protocol (LLP) operations. In clause 9 LMU – SMLC messages, data types and identifiers are given.

This version does not support segmentation of messages.

2 References

The following documents contain provisions which, through reference in this text, constitute provisions of the present document.

- References are either specific (identified by date of publication, edition number, version number, etc.) or non-specific.
- For a specific reference, subsequent revisions do not apply.
- For a non-specific reference, the latest version applies. In the case of a reference to a 3GPP document (including a GSM document), a non-specific reference implicitly refers to the latest version of that document *in the same Release as the present document*.

- [1] 3GPP TS 01.04: "Abbreviations and acronyms".
- [2] 3GPP TS 04.06: "Mobile Station - Base Station System (MS - BSS) interface Data Link (DL) layer specification".
- [3] 3GPP TS 04.07: "Mobile radio interface signalling layer 3; General aspects".
- [4] 3GPP TS 04.08: "Mobile radio interface layer 3 specification".
- [5] 3GPP TS 03.71: "Location Services (LCS); (Functional description) - Stage 2"
- [6] 3GPP TS 09.02: "Mobile Application Part (MAP) specification".
- [7] ASN.1 encoding rules "Specification of Packet Encoding Rules (PER)" ITU-T Rec. X.691 (1997) | ISO/IEC 8825-2:1998
- [8] Void.
- [9] Abstract Syntax Notation One (ASN.1) "Specification of Basic Notation" ITU-T Rec.X.680 (1997) | ISO/IEC 8824 – 1:1998
- [10] ITU-T Recommendation Q.773: "Transaction capabilities formats and encoding".
- [11] Void.
- [12] 3GPP TS 12.71: "Location Services (LCS); Location services management"

3 Abbreviations

Abbreviations used in the present document are listed in 3GPP TS 01.04 and 3GPP TS 03.71.