

TSG-RAN Working Group 3 meeting #4
Warwick 1st – 4th June 1999

TSGW3#4(99)529

3GPP TSG SA Wg 2
Tokyo 19-21st April 1999
From S2

S2-99-286 .

To: R2 & R3

Subject: Agreed changes to 23.20 on flexible use of Iu

Attached is a section from 23.20 which S2 agreed at its last meeting.

As this impacts the RNC and Iu interface S2 is forwarding the attached sections of 23.20 to R2 & R3 to inform them of the decision and request that they take account of this in their work

Source: Nortel Networks

Subject: Agreed changes to 23.20 on flexible use of Iu

7.1 General

The phase 1 UMTS/Release '99 GSM standards should provide the capability to support:

- a core network based on an evolved 2G MSC and an evolved SGSN
- an optionally evolved Gs interface
- class A GSM' mobiles.
- Transcoder location shall be according to 23.30
- UMTS/IMT2000 Phase1 (Release 99) network architecture and standards shall allow the operator to choose between Integrated and Separated core networks for transmission (including L2)
- The UMTS standard shall allow for both separated and combined MSC/VLR and SGSN configurations.
- The UE shall be able to handle separated or combined MSCs and SGSNs.
- There can be several user planes to these CN nodes.

The following general concepts should be followed :

- Separate the layer 3 control signalling from the layer 2 transport discussion (do not optimise layer 3 for one layer 2 technology).
- MSC-MSC layer 3 call control is out of scope of standardization in SMG.
- As future evolution may lead to the migration of some services from the CS-domain to the PS-domain without changes to the associated higher-layer protocols or functions. UMTS release 99 shall provide the flexibility to do this in a way that is backwards compatible with release 99 UEs provided this does not introduce significant new complexity or requirements in the system.

7.2 Iu Interface

- Transport protocol across the Iu interface for UTRAN shall be according to 23.30
- The UTRAN shall support two logically separate signalling flows via Iu to combined or separate network nodes of different types (MSC and SGSN).
- The UTRAN shall contain a "domain distribution function" to route transparent application-level control signalling from the UE to the correct core network domain. The UE shall indicate the type of application being addressed (eg via a protocol discriminator). The UTRAN shall map this on to the correct Iu instance to forward the signalling.
- UTRAN-services (including radio access bearers) shall be independent from the core network domain used to access them. Either core network domain can access any appropriate UTRAN-service (eg it should be possible to access a "speech" radio access bearer from the PS-domain).