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Agenda Item: 7.6

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Title: RNSAP modularity

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1 Introduction

lur interface is needed in UTRAN to realise different kind of UTRAN functions. UTRAN is required to hide the cell level mobility from CN and therefore the lur shall support some basic signalling between two RNS. In WCDMA the macrodiversity is used to achieve the requested quality of service, therefore there is sometimes need to set up dedicated radio links over lur. Also in order to avoid changing the SRNC the lur may be used also for transmitting common channel data between two RNS.

These different functionalities are used for different purposes and existence of all the functionalities is not always necessary. This contribution proposes that RNSAP procedures are categorised into RNSAP modules in order to allow different levels of lur to exist between RNSs.

2 Iur interface categorisation

lur interface RNSAP procedures are divided into three modules as follows:

- 1. RNSAP Basic procedures
- 2. RNSAP DCH Procedures
- 3. RNSAP CCH Procedures

Basic procedures module contains procedures used to handle the mobility within UTRAN. If procedures from this module are not used, then the cell level mobility will not be supported between corresponding RNS, and those RNSs are considered to belong to different UTRANs. .

DCH Procedures module contains procedures that are used to handle DCHs between two RNSs. If procedures from this module are not used in a specific lur, then the usage of DCH traffic between corresponding RNSs is not possible. If this category is supported then the existence of lur user plane for DCH is also assumed.

CCH Procedures module contains procedures that are used to control common channel data streams over lur interface. If the procedures within this module are not used on a specific lur, then the common channel data can not be transported between corresponding UTRANs. This lur module is considered to be optional.

3 Proposal

It is proposed that the RNSAP procedures to be included into the S3.22 are divided into the introduced categories. It is also proposed that the text in chapter 2 is included into the "lur Interface: General Aspects and Principles" (S3.20) to the chapter 4.2 " I_{ur} Interface General Principles" and to the chapter 5 of S3.23 "RNSAP Signalling protocol Specification".

It is further proposed that the currently existing RNSAP procedures shall be divided to the introduced modules as follows:

- 1. Basic procedures
 - Cell/URA Update Indication
 - SRNC Relocation Commit
 - URA Paging Request
- 2. Procedures related to dedicated channel data streams
 - Radio Link setup, Radio Link addition, Radio Link Deletion, Radio Link Reconfiguration
 - Down Link Code Reconfiguration
 - Radio Link Dropped Notification
 - DL Power Control
 - Outer Loop Power Control
 - Load Indication
 - Radio Measurement reporting
- 2. Procedures related to common channel data streams

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