

**Source:** TSG RAN WG4  
**To:** TSG RAN WG2  
**CC:** TSG RAN WG1  
**Title:** LS about outer loop performance criteria and testing

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TSG RAN WG4 would like to thank TSG RAN WG2 about informing this group about latest proceedings in their working group on outer loop performance criteria and testing.

TSG RAN WG4 recognizes the need of this requirement and would like to inform about the current status after the TSG RAN WG4#7 meeting held on 7<sup>th</sup> –10<sup>th</sup> of September.

During the meeting this issue was discussed and one contribution (R4-99484) was presented regarding this topic. The decision of this group was that performance requirements possible to test, and we started to create a performance requirement to this test. The contribution was approved in TSG RAN WG4 plenary with following changes:

- Note added below table xy stating that the performance criteria is FFS, and quality target in table is FFS.

However additional requirements and refinements of the currently approved ones are FFS in order to guarantee the respect of QoS set by the Network as outcome of the algorithm.

Response to questions raised from TSG RAN WG2, we would like to inform our view:

- Should Outer-loop control algorithm be specified in the standard or should some flexibility be provided?:
  - A specified algorithm would be difficult to be tested;
  - The lack of flexibility would prevent future improvements.
  - However since the outer loop power control function is implemented in the UE, some control are needed from the UTRAN
    - BLER, FER or BER targets, which are not depending on implementation
    - A minimum and a maximum value for the SIR target; however, it is felt that the measurement of the SIR in the UE would be implementation dependent.
    - The UTRAN shall also be able to control the downlink outer loop power control function located in the UE; e.g the UTRAN knows that quality can not be maintained during a short period due to overload; e.g UE shall ensure that it does not increase the SIR target value, when the current SIR target value has not been reached yet.

**TSG-RAN Working Group 1**  
**Kyongju, Korea, 04 – 05 October 1999**

**TSGR1#7bis(99)e64**

TSG-RAN Working Group 4 (Radio) meeting #7  
Makuhari 7<sup>th</sup> – 10<sup>th</sup> September 1999

TSGR4#7(99)572

- The base of the criteria for requirement is still under study in this group.

TSG RAN WG4 will inform relevant working groups of our proceedings in future.



"R4-99484 Outer  
loop performance.doc