**3GPP TSG-RAN WG4 Meeting #113 R4-xxxxxx**

**Orlando, USA 18th – 22nd November 2024**

**Title:** DRAFT Reply LS on LP-WUS operation in IDLE/INACTIVE mode

**Response to:** R1-2407559

**Release:** Rel-19

**Work Item:** NR\_LPWUS-Core

**Source:** Vodafone [to be RAN4]

**To:** RAN1

**Cc:** RAN2

**Contact person:** Diogo Martins, diogo.martins@vodafone.com

**Send any reply LS to: 3GPP Liaisons Coordinator,** **mailto:3GPPLiaison@etsi.org**

**Attachments:** None

1 Overall description

RAN4 thanks RAN1 for their LS on R4-2414909/R1-2407559 and would like to provide the following answer:

**Question:**

“In RAN1, the common understanding is that UE may not support LP-WUS reception on all the bands supported by the UE.

RAN1 respectfully asks RAN2 and RAN4 to check if there is any issue and specification support needed for IDLE/INACTIVE UEs.”

**Answer:**

RAN4 would like to thank RAN1 for the LS on LP-WUS operation in IDLE/INACTIVE mode. Based on the current status, the following options are presented for discussion:

* Option 1: Include RAN4 112bis RF session’s agreement in the reply LS, and RAN4 112bis RRM session’s agreement without FFS:
	+ *no specific RF work related to RAN1 LS.*
	+ *From Rel-19 RAN4 RRM requirement of MR offloading and relaxation perspective, RAN4 assumed LR and MR are operating on the same carrier frequency as baseline.*
* Option 2: Include RAN4 112bis RF session’s agreement in the reply LS, and RAN4 112bis RRM session’s agreement with FFS:
	+ *no specific RF work related to RAN1 LS.*
	+ *From Rel-19 RAN4 RRM requirement of MR offloading and relaxation perspective, RAN4 assumed LR and MR are operating on the same carrier frequency as baseline.*
		- *Option 2a: FFS for the case of MR and LR working on different carrier frequencies if it is supported in RAN1/2.*
		- *Option 2b: Note: FFS for the case of MR and LR working on different carrier frequencies if it is supported in RAN1/2.*
		- *Option 2c Include reference of RAN4 112bis RRM WF R4-2417112 or attach it in the reply LS.*
* Option 3: Include only RAN4 112bis RF session’s agreement in the reply LS (to be handled in RF session):
	+ *no specific RF work related to RAN1 LS.*
* Option 4: Do not send a reply LS in RAN4#113.

2 Actions

**To RAN 1:**

**ACTION:** RAN4 kindly asks RAN 1 to take the information above into account once deciding on the support of the use case mentioned above.

3 Dates of next TSG RAN WG 4 meetings

TSG-RAN WG4 Meeting #114 17th – 21st February 2025 Athens, Greece

TSG-RAN WG4 Meeting #114-bis 7th – 11th April 2025 TBC, China