

# ETSI TS 125 461 V11.3.0 (2019-05)



**Universal Mobile Telecommunications System (UMTS);  
UTRAN Iuant interface: Layer 1  
(3GPP TS 25.461 version 11.3.0 Release 11)**



---

**Reference**

RTS/TSGR-0325461vb30

---

**Keywords**

UMTS

**ETSI**

650 Route des Lucioles  
F-06921 Sophia Antipolis Cedex - FRANCE

---

Tel.: +33 4 92 94 42 00 Fax: +33 4 93 65 47 16

Siret N° 348 623 562 00017 - NAF 742 C  
Association à but non lucratif enregistrée à la  
Sous-Préfecture de Grasse (06) N° 7803/88

---

**Important notice**

---

The present document can be downloaded from:

<http://www.etsi.org/standards-search>

The present document may be made available in electronic versions and/or in print. The content of any electronic and/or print versions of the present document shall not be modified without the prior written authorization of ETSI. In case of any existing or perceived difference in contents between such versions and/or in print, the prevailing version of an ETSI deliverable is the one made publicly available in PDF format at [www.etsi.org/deliver](http://www.etsi.org/deliver).

Users of the present document should be aware that the document may be subject to revision or change of status.

Information on the current status of this and other ETSI documents is available at

<https://portal.etsi.org/TB/ETSIDeliverableStatus.aspx>

If you find errors in the present document, please send your comment to one of the following services:

<https://portal.etsi.org/People/CommiteeSupportStaff.aspx>

---

**Copyright Notification**

---

No part may be reproduced or utilized in any form or by any means, electronic or mechanical, including photocopying and microfilm except as authorized by written permission of ETSI.

The content of the PDF version shall not be modified without the written authorization of ETSI.

The copyright and the foregoing restriction extend to reproduction in all media.

© ETSI 2019.

All rights reserved.

**DECT™**, **PLUGTESTS™**, **UMTS™** and the ETSI logo are trademarks of ETSI registered for the benefit of its Members.  
**3GPP™** and **LTE™** are trademarks of ETSI registered for the benefit of its Members and  
of the 3GPP Organizational Partners.

**oneM2M™** logo is a trademark of ETSI registered for the benefit of its Members and  
of the oneM2M Partners.

**GSM®** and the GSM logo are trademarks registered and owned by the GSM Association.

---

# Intellectual Property Rights

## Essential patents

IPRs essential or potentially essential to normative deliverables may have been declared to ETSI. The information pertaining to these essential IPRs, if any, is publicly available for **ETSI members and non-members**, and can be found in ETSI SR 000 314: "*Intellectual Property Rights (IPRs); Essential, or potentially Essential, IPRs notified to ETSI in respect of ETSI standards*", which is available from the ETSI Secretariat. Latest updates are available on the ETSI Web server (<https://ipr.etsi.org/>).

Pursuant to the ETSI IPR Policy, no investigation, including IPR searches, has been carried out by ETSI. No guarantee can be given as to the existence of other IPRs not referenced in ETSI SR 000 314 (or the updates on the ETSI Web server) which are, or may be, or may become, essential to the present document.

## Trademarks

The present document may include trademarks and/or tradenames which are asserted and/or registered by their owners. ETSI claims no ownership of these except for any which are indicated as being the property of ETSI, and conveys no right to use or reproduce any trademark and/or tradename. Mention of those trademarks in the present document does not constitute an endorsement by ETSI of products, services or organizations associated with those trademarks.

---

# Foreword

This Technical Specification (TS) has been produced by ETSI 3rd Generation Partnership Project (3GPP).

The present document may refer to technical specifications or reports using their 3GPP identities, UMTS identities or GSM identities. These should be interpreted as being references to the corresponding ETSI deliverables.

The cross reference between GSM, UMTS, 3GPP and ETSI identities can be found under <http://webapp.etsi.org/key/queryform.asp>.

---

# Modal verbs terminology

In the present document "**shall**", "**shall not**", "**should**", "**should not**", "**may**", "**need not**", "**will**", "**will not**", "**can**" and "**cannot**" are to be interpreted as described in clause 3.2 of the [ETSI Drafting Rules](#) (Verbal forms for the expression of provisions).

"**must**" and "**must not**" are **NOT** allowed in ETSI deliverables except when used in direct citation.

---

# Contents

Intellectual Property Rights .....	2
Foreword.....	2
Modal verbs terminology.....	2
Foreword.....	4
1 Scope .....	5
2 References .....	5
3 to 4 Void.....	5
5 Iuant interface: Layer 1 .....	5
<b>Annex A: Void .....</b>	<b>6</b>
<b>Annex B (informative): Change history .....</b>	<b>7</b>
History .....	10

---

# Foreword

This Technical Specification has been produced by the 3<sup>rd</sup> Generation Partnership Project (3GPP).

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

Version x.y.z

where:

- x the first digit:
  - 1 presented to TSG for information;
  - 2 presented to TSG for approval;
  - 3 or greater indicates TSG approved document under change control.
- y the second digit is incremented for all changes of substance, i.e. technical enhancements, corrections, updates, etc.
- z the third digit is incremented when editorial only changes have been incorporated in the document.

---

## 1 Scope

See TS 37.461 [4].

---

## 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]-[3]          Void.

[4]              3GPP TS 37.461: "Iuant interface: Layer 1".

---

## 3 to 4 Void

---

## 5 Iuant interface: Layer 1

See TS 37.461 [4].

# Annex A: Void

## Annex B (informative): Change history



Change history							
Date	TSG #	TSG Doc.	CR	Rev	Subject/Comment	Old	New
September 2004	TSG-RAN#25	RP-040344	-	-	presentation to TSG-RAN for information	-	1.0.0
September 2004	TSG-RAN#25	RP-040344	-	-	approved at TSG-RAN#25 and placed under change control	1.0.0	6.0.0
12/2004	26	RP-040444	1		DC power supply distribution	6.0.0	6.1.0
12/2004	26	RP-040444	2	1	Improved demodulator characteristics specification	6.0.0	6.1.0
12/2004	26	RP-040444	3	-	Requirements missing for when the RS485 bus shall not be driven by the secondary device	6.0.0	6.1.0
12/2004	26	RP-040444	4	1	RET DC power consumption modes	6.0.0	6.1.0
12/2004	26	RP-040444	5	-	Minor Corrections and editorial changes to 25.461	6.0.0	6.1.0
03/2005	27	RP-050061	7	1	Minor Corrections and editorial changes to 25.461	6.1.0	6.2.0
03/2005	27	RP-050061	8	1	Power consumption clarification of RET	6.1.0	6.2.0
03/2005	27	RP-050061	9		Modem Operating Bands	6.1.0	6.2.0
03/2005	27	RP-050061	10		Modem Return loss	6.1.0	6.2.0
03/2005	27	RP-050061	11		Modem Time Delay and Accuracy	6.1.0	6.2.0
03/2005	27	RP-050061	12		Modem Insertion Loss	6.1.0	6.2.0
06/2005	28	RP-050237	13	1	DC power on sequence	6.2.0	6.3.0
06/2005	28	RP-050237	15	-	BS Modem and RET Modem Filtering	6.2.0	6.3.0
06/2005	28	RP-050237	16	-	BS Modem and RET modem spectrum emission mode	6.2.0	6.3.0
06/2005	28	RP-050237	17	-	BS modem and RET modem return loss at modem frequency	6.2.0	6.3.0
06/2005	28	RP-050237	18	-	Time delay clarification	6.2.0	6.3.0
06/2005	28	RP-050226	19	-	Introduction of UMTS2600 requirements	6.3.0	7.0.0
09/2005	29	RP-050438	21	1	Power-Up period clarifications	7.0.0	7.1.0
09/2005	29	RP-050438	23		Insertion loss for RET	7.0.0	7.1.0
09/2005	29	RP-050438	25		Testing for RET	7.0.0	7.1.0
09/2005	29	RP-050438	27		Time delay for RET	7.0.0	7.1.0
09/2005	29	RP-050438	29		Intermodulation attenuation for RET	7.0.0	7.1.0
09/2005	29	RP-050438	31		BS and RET modem isolation	7.0.0	7.1.0
12/2005	30	RP-050704	32	1	Introduction of UMTS 1700 requirements	7.1.0	7.2.0
12/2005	30	RP-050703	33		Introduction of UMTS 900	7.1.0	7.2.0
12/2005	30	RP-050689	35		Test Procedures	7.1.0	7.2.0
12/2005	30	RP-050689	37		Correction to modem isolation and emission	7.1.0	7.2.0
12/2005	30	RP-050689	39		correction of referencing	7.1.0	7.2.0
12/2005	30	RP-050689	41	1	RET Control Unit spurious emission simplified version	7.1.0	7.2.0
12/2006	34	RP-060704	42		Introduction of Band X (Extended UMTS 1.7/2.1 GHz)	7.2.0	7.3.0
03/2007	35	RP-070058	44	1	Update of DC Power Supply Requirements	7.3.0	7.4.0
03/2007	35	RP-070058	45		Tower Mounted Amplifier amendment	7.3.0	7.4.0
06/2007	36	RP-070323	47		Word alignment of station-device	7.4.0	7.5.0
09/2007	37	RP-070576	48		Introduction of UMTS1500 requirement	7.5.0	8.0.0
03/2008	39	RP-080082	49	1	Introduction of UMTS 700 MHz (Bands XII XIV)	8.0.0	8.1.0
09/2009	45	RP-090822	51		Introduction of E-UTRA operating bands	8.1.0	
		RP-090826	53	1	Introduction of the extended UMTS/LTE 800 MHz bands		9.0.0
09/2009	46	RP-091185	54	1	Introduction of Extended UMTS/LTE1500 requirements for TS25.461	9.0.0	9.1.0
03/2010	47	RP-100223	58		Introduction of UMTS/LTE in 800 MHz for Europe requirements in TS 25.461	9.1.0	9.2.0
09/2010	49	RP-100912	59	-	Spectrum band definition additions for TDD 2600 MHz	9.2.0	10.0.0
12/2010	50	RP-101361	59a	1	Introduction of L-band in TS 25.461	10.0.0	10.1.0
12/2010	50	RP-101278	61	2	CR UMTS/LTE-3500 spectrum band definition additions for TDD luant interface to TS 25.461	10.0.0	10.1.0
12/2010	50	RP-101334	66		Band XII channel arrangement correction on 25.461	10.0.0	10.1.0
03/2011	SP-49	SP-100629			Clarification on the use of References (TS 21.801 CR#0030)	10.1.0	10.1.1
06/2011	52	RP-110699	70		Add 2 GHz band LTE for ATC of MSS in North America to TS25.461 (Rel-10)	10.1.1	10.2.0
06/2011	52	RP-110696	71		Add Expanded 1900 MHz Band for UTRA and LTE to TS25.461 (Rel-10)	10.1.1	10.2.0
06/2011	52	RP-110685	73		Removal of unused references	10.1.1	10.2.0
12/2011	54	RP-111733	76		Removal of references to operating bands i) and h)	10.2.0	10.3.0
03.2012	55				Creation of Rel-11 version based on v. 10.3.0	10.3.0	11.0.0
03/2012	55	RP-120235	78		Addition of new Band 26 for E850	10.3.0	11.0.0
06/2012	56	RP-120749	79	1	Introduction of E850_LB (Band 27) to TS 25.461	11.0.0	11.1.0
06/2012	56	RP-120750	80	-	Introduction of Band 28	11.0.0	11.1.0
06/2012	56	RP-120750	81	-	Introduction of Band 44	11.0.0	11.1.0
12/2012	58	RP-121736	82	-	Introduction of band 22 in TS 25.461	11.1.0	11.2.0
12/2012	58	RP-121735	83	1	Introduction of Band 29 into TS 25.461	11.1.0	11.2.0

<b>Change history</b>							
<b>Date</b>	<b>Meeting</b>	<b>TDoc</b>	<b>CR</b>	<b>Rev</b>	<b>Cat</b>	<b>Subject/Comment</b>	<b>New version</b>
2019-04	RAN#83	RP-190557	0116	-	F	Transfer of luant interface specification from 25-series to 37-series	11.3.0

---

# History

<b>Document history</b>		
V11.1.0	November 2012	Publication
V11.2.0	January 2013	Publication
V11.3.0	May 2019	Publication