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IR 2068 - UK Interface Requirement 2068

For Spectrum Access in the Band 1452 – 1492 MHz

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References

- 1.1 COMMISSION IMPLEMENTING DECISION (EU) 2015/750 of 8 May 2015 on the harmonisation of the 1 452-1 492 MHz frequency band for terrestrial systems capable of providing electronic communications services in the Union.
- 1.2 ETSI EN 301 908 Title: IMT cellular networks; Harmonized EN covering the essential requirements of article 3.2 of the Radio Equipment Directive (Directive 2014/53/EU); Part 18: "E-UTRA, UTRA and GSM/EDGE Multi-Standard Radio (MSR) Base Station (BS)".
- 1.3 ETSI EN 301 908 Title: IMT cellular networks; Harmonized EN covering the essential requirements of article 3.2 of the Radio Equipment Directive (Directive 2014/53/EU); Part 14: "Evolved Universal Terrestrial Radio Access (E-UTRA) Base Stations (BS)".
- 1.4 ETSI EN 301 908 Title: IMT cellular networks; Harmonized EN covering the essential requirements of article 3.2 of the Radio Equipment Directive (Directive 2014/53/EU); Part 3: "CDMA Direct Spread (UTRA FDD) Base Stations (BS)".
- 1.5 ETSI TS 136 104 Title: LTE; Evolved Universal Terrestrial Radio Access (E-UTRA); Base Station (BS) radio transmission and reception.
- 1.6 ETSI TS 125 104 Title: Universal Mobile Telecommunications System (UMTS); Base Station (BS) radio transmission and reception (FDD).

Foreword

- 2.1 The Radio Equipment Directive (Directive 2014/53/EU) was implemented in the United Kingdom (UK) by the Radio Equipment Regulations 2017. In accordance with Articles 8 and 7 of Directive 2014/53/EU, this UK Interface Requirement contains the requirements for the authorisation and use of radio equipment in the specified frequency bands.
- 2.2 Nothing in this UK Radio Interface Requirement shall preclude the need for equipment to comply with Directive 2014/53/EU.
- 2.3 It is required by the Wireless Telegraphy Act 2006 that no radio equipment is installed or used in the UK except under the authority of a licence granted by or otherwise exempted by regulations made by Ofcom. It is a condition of such a licence or exemption regulations as appropriate that, in order to be installed or used in the UK, the equipment must meet the minimum requirements specified in this UK Interface Requirement for the stated equipment types and for the stated frequency bands. Nothing in this UK Interface Requirement shall preclude equipment from being placed on the market in the UK that complies with the 'essential requirements' specified in Directive 2014/53/EU.
- 2.4 The requirements given in the main body of this UK Radio Interface Requirement will apply to the licensing of radio equipment in the band 1452 1492 MHz.
- 2.5 This UK Radio Interface Requirement will be revised as necessary, for example to follow:
 - current technology developments for reasons related to the effective and appropriate use of the spectrum in particular maximising spectrum utilisation; and
 - ii) changes to the available spectrum allocated for spectrum access in the band 1452 1492 MHz.
- 2.6 All UK Radio Interface Requirements notified under Directive 2015/1535/EU will be published and will be made available free of charge from the Ofcom web-site at http://www.ofcom.org.uk.
- 2.7 Further information on this UK Radio Interface Requirement can be obtained from the technical enquiry contact given at the back of this document.

Minimum requirements for operation within the UK

- 3.1 The minimum requirements in this document are made for reasons related to the effective and appropriate use of the radio spectrum, in particular maximising spectrum utilisation.
- 3.2 This UK Radio Interface Requirement gives a high level description of how the spectrum in the UK is used for spectrum access in the band 1452 1492 MHz. It does not prescribe technical interpretation of the 'essential requirements' of Directive 2014/53/EU.
- 3.3 This UK Radio Interface Requirement therefore stipulates the necessary equipment parameters for the licensing of radio equipment in the band 1452 1492 MHz in the UK. Tables 3.1 contain the relevant equipment parameters. These taken together with the 'essential requirements' detailed in Article 3.2 of Directive 2014/53/EU constitute the minimum requirements for radio equipment in the band 1452 1492 MHz within the UK. Nothing in this UK Interface Requirement shall preclude equipment from being placed on the market in the UK that complies with the 'essential requirements' specified in Directive 2014/53/EU.
- 3.4 The technical parameters specified in the UK Radio Interface Requirement are applied to achieve the desired level of compatibility within the band 1452 1492 MHz and with other radiocommunications services, whilst promoting enterprise, innovation and competition.
- 3.5 This UK Radio Interface requirement provides the necessary technical information which facilitates access to the 1452 1492 MHz spectrum by making clear the assumptions that are made in planning the use of the relevant spectrum in the UK. It is not the intention of this UK Radio Interface Requirement to duplicate or impose any additional 'essential requirements' of the Directive 2014/53/EU on products. Any specified parameters within this document are for the purpose of identifying product options and not as a national de facto product requirement.

Table 3.1: Minimum requirements for the use of: - radio equipment					
ope	operating in the 1452 - 1492 MHz band				
Mandatory (1-10)					
4	Fraguanay hand(a)	1450	1400 MILI-		

manad				
1	Frequency band(s)	1452 – 1492 MHz		
2	Radiocommunication Service	Any		
3	Application	Any		
4	Channelling	Yes see table 3.1.1 below		
5	Modulation / Occupied bandwidth	N/A		
6	Direction / Separation	N/A		
7	Maximum Transmit Power Density	68dBm/5MHz		
		Notes-1 and 2		
8	Channel access and occupation	N/A		
	rules			
9	Authorisation regime	Licensed		
10	Additional essential requirements	N/A		
	ative (11-13)			
11	Frequency planning assumptions			
12	Planned changes			
13	Reference			
14	Notification	2015/280/UK		
15	Remarks			
Note	Co-ordination and site clearance considerations may impose additional restrictions			
1	on the maximum system e.i.r.p. allowed on specific frequencies, directions and			
	locations.			
Note	See Table 3.1.2 below for base station out of block limits within the band 1452-			
2	1492MHz			

Table 3.1.1: Band plan for the 1452-1492 MHz							
1452 – 1457	1457 – 1462	1462 – 1467	1467 – 1472	1472 – 1477	1477 – 1482	1482 – 1487	1487 - 1492
Downlink (base station transmit)							
40 MHz (8 blocks of 5 MHz)							

Table 3.1.2: Base Station out-of-block EIRP limits within the band 1452-1492 MHz				
Frequency range of out-of-block emissions	Maximum mean out-of- band e.i.r.p. (dBm)	Measurement Bandwidth		
–10 to –5 MHz from lower block edge	11.0	5		
–5 to 0 MHz from lower block edge	16.3	5		
0 to +5 MHz from upper block edge	16.3	5		
+5 to +10 MHz from upper block edge	11.0	5		
Remaining MFCN SDL frequencies	9.0	5		

Section 4 Additional performance parameters (informative)

None specified

Contact details

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Document history

Version	Date	Changes
1.	March 2008	Original publication
2.	September 2015	Revised as a consequence of licence variation and EC
0		Decision.
2.0		Replaced R&TTE Directive 1999/5/EC and Directive 98/34/EC with Radio Equipment Directive 2014/53/EU and Directive (EU) 2015/1535 respectively. Minor editorials