

Notification of the Broadcasting Affairs Committee National Television and Telecommunications Business

story Teleological standards of telecommunications machines and equipment
Radio communications equipment in the field of operations Frequency band 57
- 66 gigahertz

It is expedient to improve the technical standards of telecommunications machines and equipment. For radio communications in the business of The frequency band 57 - 66 gigahertz is suitable for the technological boom in radio communications.

Relying on the provisions of Section 100. 27 (10) and (24) and Section 81 of the Spectrum Allocation Corporations Act and the operation of radio broadcasting businesses. Radio and television and affairs Telecommunications Act 2010 is incorporated by Section 32 of the Telecommunications Act. and section 29 (4) of the Radio Communications Act 1955. Broadcasting Business The National Television and Telecommunications Authority issued a notice. as follows

Item 1 This notice shall be in force from the day following the date of the contest in the Gazette onwards.

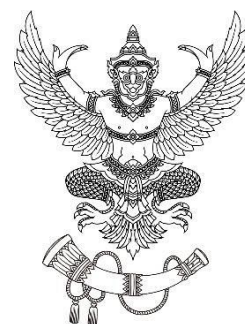
Article 2 repeals the Notification of the National Broadcasting, Television and Telecommunications Commission. story Technical standards of telecommunications machines and equipment For radio communications in the business Radio frequency band 57 - 66 gigahertz dated October 13. 2016

Item 3. Those announcements regulation Regulations or other orders In respect of those already provided in this Notice or which are contrary to or inconsistent with this Notice, this Notice shall be used instead.

Article 4 Technical Standards of Telecommunications Machines and Equipment For radio communications in the business of Frequency band 57 - 66 gigahertz to meet the technical standards of telecommunications machines and equipment. NBTC No. M.T. 1031 - 2022 .

Announcements at 23rd
Dhanawakom, 2022, Clinical
Professor, Sarna. Boon BaiChaipruk,
Chairman of the National Broadcasting,
Television and Telecommunications

Committee



Technical standards of telecommunications machines and equipment

NBTC MOT 1031 - 2022

Radio communications in the field of operations Band 57 - 66 gigahertz

**Broadcasting Commission National Television and Telecommunications Business 87
Phaholyothin Road Soi 8 Samsennai Subdistrict , PhayaThai District , Bangkok**

10400

Tel. 0 2670 8888 Website: www.nbtc.go.th

**Technical standards of telecommunications machines
and equipment NBTC M.T. 1031 - 2565
Radio communications in the field of communications That's it.**

table of contents

			face
1		Scope	
1			2
	Radio Frequency Requirements		1
	2.1 and (e.i.r.p.)	Output isotropic air output	power 1
	2.2 Spurious	emissions	1
32		Test method	
	3.1 and (e.i.r.p.)	Output isotropic air output	power 2
	3.2 Spurious	emissions	2
	Electrical		4
		Requirements	Safety
2			
5	. Display of conformity to technical standards		3
		References	4

**Technical standards of telecommunications machines
and equipment NBTC M.T. 1031 - 2565
Radio communications in the field of communications That's it.**

**Technical standards of telecommunications machines
and equipment NBTC M.T. 1031 - 2565
Radio communications in the dasha That's it. Frequency bands 57 - 66**

1. scope

This technical standard specifies the minimum technical characteristics of radio communications equipment in the field.

Frequency bands 57 - 66 gigahertz or as specified by the NBTC S.S.A. For outdoor use only.

The use of radio communications in the field of operations Frequency 57 - 66 gigahertz Must comply with the criteria for the use of radio communications in the business. Frequency bands 57 - 66 gigahertz or according to the NBTC S.S.A.

2. Radio Frequency Requirements

Technical standards on the frequency of radio communications in the field of operations Bands 57 - 66

Gigahertz shall be as specified. as follows

2.1 Output power and isotropic air output (e.i.r.p.)

Output power At the Agassiz cable connector Peak output power **must** not exceed 500. milliwatts (27 dBm) and isotropic equivalence air output (e.i.r.p.) of radio communications machines in the field of operations. Band 57 - 66 gigahertz It must be consistent with the specified limit. Either one. as follows

2.1.1	Average isotropic air output is not more than 40 dBm or Isotropic air output up to 43 dBm
2.1.2	Average isotropic air output does not exceed 82 dBm or Isotropic air output up to 85 dBm Case $G_{ant} \cdot 51$ dBi. where G_{ant} is Antenna gain
2.1.3	The average isotropic equivalence air output does not exceed $82 - (2 \times (51 - G_{ant}))$ dBm or Maximum isotropic equivalence air output is not more than $85 - (2 \times (51 - G_{on}))$ dBm Case $G_{ant} < 51$ dBi where G_{ant} is Antenna gain

2.2 Spurious emissions

Diffusion of transmission sectors of radio communications in the field of communications . The bands 57 - 66 gigahertz must meet one of the standards. as follows

**Technical standards of telecommunications machines
and equipment NBTC M.T. 1031 - 2565
Radio communications in the dasha That's it. Frequency bands 57 - 66**

2.2.1 ETSI EN 302 217- 3 : Fixed Radio Systems; Characteristics and requirements for point-to- point equipment and antennas; Part 3: Equipment operating in frequency bands where both frequency coordinated or uncoordinated deployment might be applied; Harmonized EN covering the essential requirements of article 3. 2 of the R&TTE Directive - clause 4.3.3

2.2.2 Code of Federal Regulations (USA): Title 47 Telecommunication; Chapter 1 Federal Communications Commission; Part 15 Radio Frequency Devices; Subpart C - Intention Radiators; §15.255 Operation within the band 57-71 GHz; (d) Limits on spurious emissions

2.2.3 ITU- R Recommendation SM. 329- 12: Unwanted emissions in the spurious domain

2.2.4 ETSI EN 303 722 : Wideband Data Transmission Systems (WDTs) for Fixed Network Radio Equipment operating in the 57 GHz to 71 GHz band; Harmonised Standard for access to radio spectrum

3. Test method

3.1 Output power and isotropic air output (e.i.r.p.)

The test method must comply with ETSI EN 302 217-3 [1] or ANSI C63.10 [2] or ETSI EN.

303 722 [3] or Other equivalent test methods

3.2 Spurious emissions

The test method must comply with ETSI EN 302 217-3 or ANSI C63.10 or ETSI EN 303 722. or ITU-R Recommendation SM. 329-12 [4] or another equivalent test method.

4. Electrical Safety Requirements

Technical standards for electrical safety of radio communications machines in the field of operations Bands 57 - 66 gigahertz shall be in accordance with one of the standards. as follows

4.1	IEC 60950-1 :	Information Technology Equipment - Safety - Part 1: General Requirements
4.2	TIS 1561 - 2556 : Or the current edition.	Information Technology Services- Security , Volume 1 Common preferred features
4.3	IEC 62368-1 :	Audio/Video, information and Communication technology equipment - Part 1: Safety Requirements
4.4	TIS 62368 Volume 1-2563 : Or the current edition.	Audio Services Video Information Technology Services and Communication, Volume 1 Safety Requirements

**Technical standards of telecommunications machines
and equipment NBTC M.T. 1031 - 2565
Radio communications in the dasha That's it. Frequency bands 57 - 66**

5. Display of conformity to technical standards

Radio communications in the field of operations Bands 57 - 66 gigahertz shall show compliance with this standard, which is considered as a telecommunications machine and equipment. category Class A equipment as defined in the Broadcasting Commission's announcement. National Television and Telecommunications Business story Inspection and certification of standards of telecommunications machines and equipment

**Technical standards of telecommunications machines
and equipment NBTC M.T. 1031 - 2565
Radio communications in the dasha That's it. Frequency bands 57 - 66**

reference

- [1] ETSI EN 302 217- 3: Fixed Radio Systems; Characteristics and requirements for point- to- point equipment and antennas; Part 3: Equipment operating in frequency bands where both frequency coordinated or uncoordinated deployment might be applied; Harmonized EN covering the essential requirements of article 3.2 of the R&TTE Directive
- [2] ANSI C63.10: American National Standard of Procedures for Compliance Testing of Unlicensed Wireless Devices
- [3] ETSI EN 303 722: Wideband Data Transmission Systems (WDTS) for Fixed Network Radio Equipment operating in the 57 GHz to 71 GHz band; Harmonised Standard for access to radio spectrum
- [4] ITU-R Recommendation SM. 329-12: Unwanted emissions in the spurious domain
- [5] Code of Federal Regulations (USA) : Title 47 Telecommunication; Chapter 1 Federal Communications Commission; Part 15 Radio Frequency Devices; Subpart C - Intention Radiators; §15.255 Operation within the band 57-71 GHz; (d) Limits on spurious emissions