ICNIRP Measurement Report

This report presents the results of measurements of electromagnetic field emission levels in the vicinity of mobile base stations. Results are presented as percentages of the power density reference levels for general public exposure in the 1998 edition of the Guidelines published by the International Commission on Non-Ionizing Radiation Protection (ICNIRP)[1], with figures provided for individual frequency bands used for base station (downlink) transmissions as well as an overall figure for all other frequency bands between 30 MHz to 6 GHz. The total percentage equals the sum of all individual percentages.

The power density reference levels in the ICNIRP Guidelines are the root mean square (rms) values averaged over six minutes. In this report, we have measured the average E-field strength over a six-minute period in each measurement location.

We have applied a measurement threshold of 3dB above the system noise floor[2] of the measurement equipment, below which any E-field strength levels measured are deemed not sufficiently above the system noise floor to be valid. In the results tables below, measurement results are shown to a precision of four decimal places. Results which are not sufficiently above the system noise floor to record as a valid measurement are shown as a dash (-). Results which are too small to register to four decimal places are shown as 0.0000%.

Date of Survey:	18/06/2026	**Time Survey completed:**	09:58
Survey address:	Thirsk YO7		

Measurement equipment		Serial number	Calibration Date
Meter	Keysight Fieldfox N9915A Spectrum Analyser	MY56072594	25/11/2025
Probe	Agos Aria-6000 Antenna	ARIA-6000-1156	08/07/2025
Cabling	1.7m cable	2063	18/02/2026

[1] https://www.icnirp.org/cms/upload/publications/ICNIRPemfgdl.pdf

[2] The noise floor of the measurement equipment is the level of background noise that is present before detecting any external signals. In other words, it indicates the absolute minimum level of detectable signals.

Broadcast bands covered by this report

Frequency Band	Frequency Range	Technology*
	87.5-108 MHz	FM Radio
	174-230 MHz	DAB
	470-694 MHz	Digital TV

Mobile bands covered by this report

Frequency Band	Frequency Range	Technology*
700 MHz	738-788 MHz	4G, 5G
800 MHz	791-821 MHz	4G
900 MHz	925-960 MHz	2G, 3G, 4G
1400 MHz	1452-1492 MHz	4G (Supplementary downlink)
1800 MHz	1805-1880 MHz	2G, 4G
1900 MHz	1900-1920 MHz	4G
2100 MHz	2110-2170 MHz	3G, 4G
2300 MHz	2350-2390 MHz	4G
2600 MHz TDD	2570-2620 MHz	4G
2600 MHz FDD	2620-2690 MHz	4G
3.4 GHz	3410-3680 MHz	5G, 4G
3.8 GHz	3680-4200 MHz	Various
Others**		

** This is an indication of the type of technologies typically deployed in these bands; not all frequency bands and technologies may be in use at all locations. ** All other frequencies between 30 MHz and 6 GHz.*

Survey locations

The survey was conducted within the area shown in the map below. Measurements were taken at six locations and are presented in the following pages of this report.



Location 1

Measurement time:	09:03
Frequency band	**Percentage of the ICNIRP reference levels for general public exposure**
87.5-108 MHz	0.01440
174-230 MHz	0.00937
470-694 MHz	0.00752
700 MHz	0.00145
800 MHz	0.04314
900 MHz	0.00053
1400 MHz	0.00035
1800 MHz	0.02081
1900 MHz	0.00017
2100 MHz	0.00101
2300 MHz	0.00038
2600 MHz TDD	0.00032
2600 MHz FDD	0.00016
3.4 GHz	0.00180
3.8 GHz	0.00425
Others	0.12411
Total	**0.22978**

Location 2

Measurement time:	09:13
Frequency band	**Percentage of the ICNIRP reference levels for general public exposure**
87.5-108 MHz	0.00975
174-230 MHz	0.00998
470-694 MHz	0.00795
700 MHz	0.00156
800 MHz	0.03114
900 MHz	0.00055
1400 MHz	0.00038
1800 MHz	0.00814
1900 MHz	0.00018
2100 MHz	0.00067
2300 MHz	0.00042
2600 MHz TDD	0.00034
2600 MHz FDD	0.00018
3.4 GHz	0.00195
3.8 GHz	0.00460
Others	0.13367
Total	**0.21145**

Location 3

Measurement time:	09:21
Frequency band	**Percentage of the ICNIRP reference levels for general public exposure**
87.5-108 MHz	0.03306
174-230 MHz	0.01055
470-694 MHz	0.00828
700 MHz	0.00163
800 MHz	0.05296
900 MHz	0.00061
1400 MHz	0.00040
1800 MHz	0.01095
1900 MHz	0.00019
2100 MHz	0.00067
2300 MHz	0.00043
2600 MHz TDD	0.00037
2600 MHz FDD	0.00019
3.4 GHz	0.00208
3.8 GHz	0.00490
Others	0.14045
Total	**0.26772**

Location 4

Measurement time:	09:34
Frequency band	**Percentage of the ICNIRP reference levels for general public exposure**
87.5-108 MHz	0.01116
174-230 MHz	0.01112
470-694 MHz	0.00873
700 MHz	0.00164
800 MHz	0.04589
900 MHz	0.00060
1400 MHz	0.00042
1800 MHz	0.00316
1900 MHz	0.00020
2100 MHz	0.00067
2300 MHz	0.00047
2600 MHz TDD	0.00039
2600 MHz FDD	0.00020
3.4 GHz	0.00225
3.8 GHz	0.00528
Others	0.15025
Total	**0.24242**

Location 5

Measurement time:	09:44
Frequency band	**Percentage of the ICNIRP reference levels for general public exposure**
87.5-108 MHz	0.01083
174-230 MHz	0.01144
470-694 MHz	0.00897
700 MHz	0.00133
800 MHz	0.01294
900 MHz	0.00064
1400 MHz	0.00044
1800 MHz	0.00642
1900 MHz	0.00020
2100 MHz	0.00100
2300 MHz	0.00048
2600 MHz TDD	0.00040
2600 MHz FDD	0.00021
3.4 GHz	0.00232
3.8 GHz	0.00543
Others	0.15460
Total	**0.21765**

Location 6

Measurement time:	09:52
Frequency band	**Percentage of the ICNIRP reference levels for general public exposure**
87.5-108 MHz	0.01607
174-230 MHz	0.01176
470-694 MHz	0.00915
700 MHz	0.00223
800 MHz	0.09874
900 MHz	0.00064
1400 MHz	0.00044
1800 MHz	0.01291
1900 MHz	0.00021
2100 MHz	0.00166
2300 MHz	0.00049
2600 MHz TDD	0.00041
2600 MHz FDD	0.00021
3.4 GHz	0.00239
3.8 GHz	0.00562
Others	0.15881
Total	**0.32174**

Disclaimer: The results detailed in this report apply only to the tests made at the reported time, using the test equipment detailed. They do not indicate that on another date an identical set of results would be achieved, due to changes in local environmental conditions or other factors which may or may not have an effect on the measurement results obtained at that future time.