

SPECIFICATION & INSTRUCTIONS

SPECAN TOUCH 2

DATE

24 JULY 2026

VERSION

1.0

BASIC OVERVIEW

DIMENSIONS

DIMENSIONS - 262x182x78

WEIGHT - 6KG

MATERIAL - Steel

PORTS:

Hi-Speed USB C Charging

1 x Wideband Antenna

1 x 700-2600Mhz Antenna

1 x 868-915MHz Antenna



FIRMWARE

Range - 1MHz to 6GHz

Graph Mode

Waterfall Mode

Record Mode

Various Range RX Control

"Show Peaks" Function

Up to 20 million samples per second

POWER

0%-100% Charge Time: Approx 45 mins

Battery Run Time: Approx 2hrs 40mins

SUMMARY

Our spectrum analyser has a number of functions designed to help TSCM operators in the analysis of radio frequencies by breaking down the data in a simplified yet comprehensive format.

INTRODUCTION

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The Specan Touch 2 is an innovative spectrum analyser, meticulously designed by British engineers and experts in technical surveillance countermeasures. This groundbreaking device is renowned as the world's first touchscreen-only spectrum analyser and is encased in a robust steel casing, ensuring durability and reliability in various operational environments.

The Specan Touch 2, with its British engineering excellence, robust construction, and innovative features, is an indispensable tool for professionals requiring precision and versatility in signal analysis and surveillance countermeasures. Its combination of a high-quality touchscreen, steel casing, and specialised antennas makes it a standout choice in the field of technical surveillance countermeasures.



INTRODUCTION

OVERVIEW OF THE SPECAN TOUCH

- **10-inch Touchscreen Display:** A pioneering feature in spectrum analysers, the Specan Touch's large, 10-inch touchscreen offers intuitive navigation and control, enhancing user interaction and efficiency in signal analysis.

- **Broad Frequency Range:** With its extensive 0-6 GHz bandwidth, this device captures a wide spectrum of signals, from low-frequency communications to high-frequency wireless transmissions, ensuring comprehensive signal analysis.

- **Multifunctional Interface:** Operators can analyse a diverse array of signals including Bluetooth, Wi-Fi, cellular, and other signals within its range, thanks to its adaptable and user-friendly interface.

- **Advanced Analysis Features:** The Specan Touch's waterfall and 'Show Peaks' features make identifying potentially malicious signals easier, especially within its variable range settings.

- **Durable Steel Casing:** Built to withstand challenging field conditions, the device is encased in a sturdy steel body, providing extra protection, zero RF interference and longevity.

- **Three Specialised Antennas:** The device includes three custom-designed antennas, each tailored to enhance reception capabilities for specific signal types. One antenna is dedicated to wideband signals, another for cellular frequencies, and the third for Bluetooth/Wi-Fi signals, ensuring optimal performance and accuracy in various surveillance scenarios.

- **Portable and User-Friendly:** Despite its advanced technology and durable build, the Specan Touch 2 remains portable and user-friendly, making it an invaluable tool for law enforcement, security professionals, and technical surveillance countermeasures experts.

INSTRUCTIONS

SAFETY INFORMATION

Warning: Proper Handling Required

- Handle the device with care. Dropping or mishandling the device can cause damage.
- Do not insert any objects into the ventilation holes or ports.
- Avoid using the device in environments with excessive dust, moisture, or vibrations.

Warning: Overheating Hazard

- Avoid operating the device in extreme temperatures. Refer to the specifications for the recommended operating temperature range.

Warning: Use Correct Power Source

- Use only the charging plug and lead provided with the device or a replacement specified by the manufacturer.
- Ensure the power source matches the following outputs:
  - Voltage - 5V
  - Current - 1A
  - Power - 5W

Warning: Qualified Service Personnel

- Do not attempt to repair or modify the device yourself. Only Calibre service personnel should perform repairs.

INSTRUCTIONS

GETTING STARTED

- The device will require sufficient battery charge to operate. The device may not work whilst on charge.
- **POWER ON -** Press the power button once to turn the device on. It will take a while to self-calibrate and start operating.
- **POWER OFF -** To turn the device off, press the power button twice in quick succession.





INSTRUCTIONS

GETTING STARTED

- **ANTENNAS -** Please refer to the images provided. The easiest way to remember the correct order from left to right is small, medium, large.





INSTRUCTIONS

CONTROLS

1. SENSITIVITY.

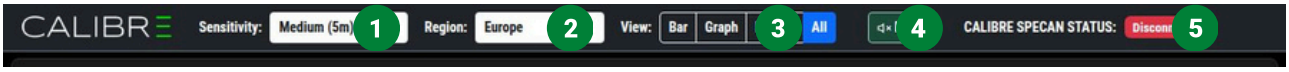
MIN - Analyses an isotropic radius of approximately 3-5 metres.
MED - Analyses an isotropic radius of approximately 5-10 metres.
HIGH - Analyses an isotropic radius of approximately 10-25 metres.

2. REGION - The “REGION” function allows the user to change the locality of the machine. This will automatically synchronise the local cellular data meaning that the SPECAN TOUCH 2 can be used anywhere in the world without the need for manufacturer calibration.

3. VIEW - The “VIEW” or mode function enables the user to switch between the Bar, Graph, Record and All views. The same thing can be achieved simply by touching whichever mode the user would prefer to view.

3. MUTE - Silences or enables audible signal alerts.

5. STATUS - Shows whether the SPECAN internal hardware is connected.



INSTRUCTIONS

CONTROLS

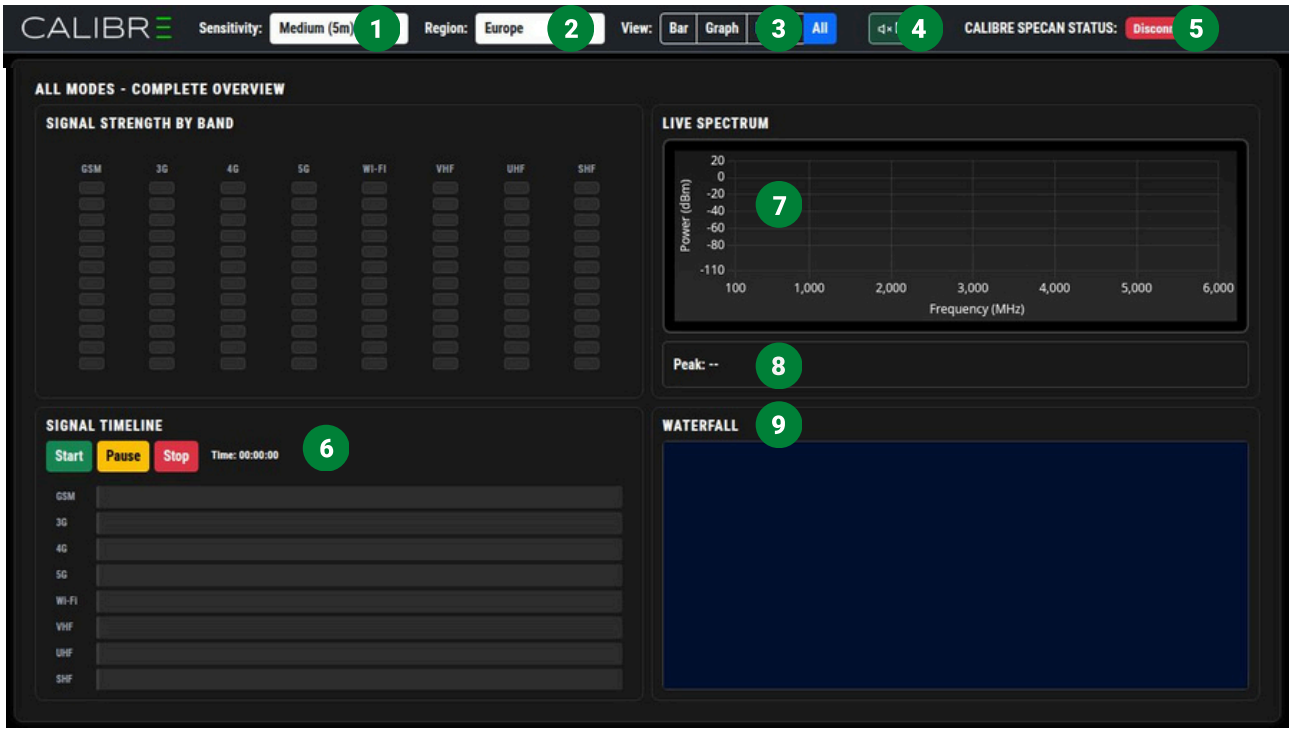
6. TIMELINE - The “TIMELINE” function allows the user to monitor the environment over a 45 minute period. The graph will show any activity across all bands.

7. LIVE SPECTRUM - Displays the spectrum in graph format. The waterfall will also be shown in the same window both in ALL VIEW and this option.

8. PEAK READING - Shows the strongest current signal and its frequency.

9. WATERFALL - Displays signal activity over time using colour.

SHOW PEAKS - This function allows the user to see any increase in received signals over the period stated in the SHOW PEAKS TIME OPTION. This enabled the operator to leave the device whilst it continues to scan without having to watch the screen during that period for any significant readings.



INSTRUCTIONS

CONTROLS

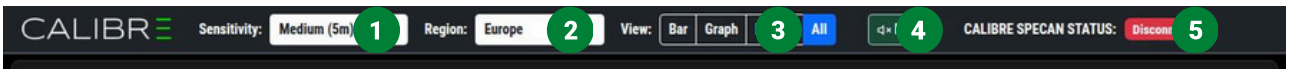
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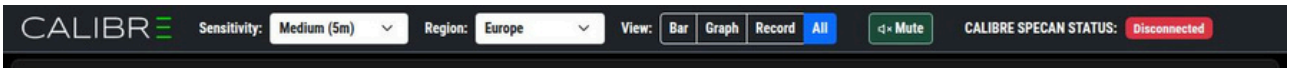
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INSTRUCTIONS

START MONITORING



1 CONFIRM CONNECTION

Check the top-right status indicator. Begin scanning after it shows that the SPECAN hardware is connected.

2 SELECT YOUR REGION

Choose the region in which the unit is being operated. This applies the appropriate cellular frequency ranges.

3 SET SENSITIVITY

Begin at Low or Medium and increase only when you need a wider detection area.

Setting	Approximate radius stated in source document	Suggested use
Low	3–5 metres	Close inspection and source localisation.
Medium	5–10 metres	General room or area survey.
High	10–25 metres	Broad initial sweep; may show more distant signals.

INSTRUCTIONS

UNDERSTAND THE DISPLAY

Spectrum graph

The trace shows received signal strength across frequency. A rising spike indicates increased RF energy around that frequency.

Waterfall

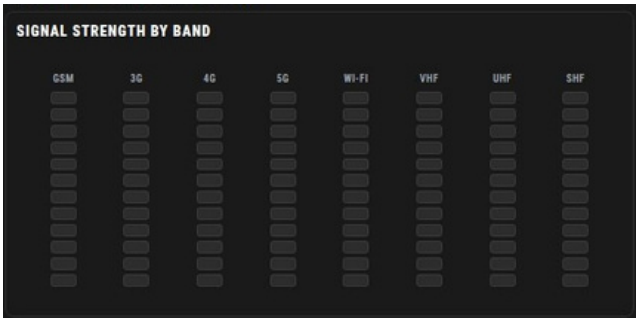
The waterfall shows signal activity over time. Stronger signals appear in lighter, warmer colours; repeated vertical marks can reveal pulsing signals.

Show Peaks

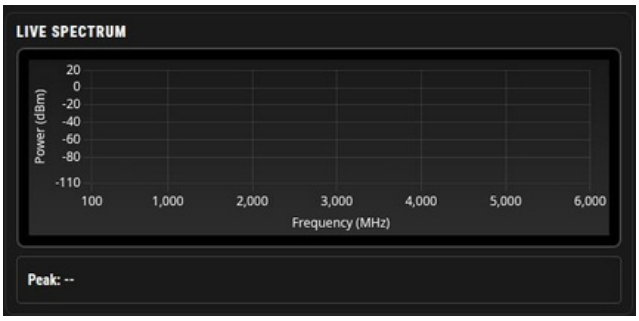
Enable this when you cannot watch the screen continuously. It keeps significant spikes visible for the selected peak time.

Touch inspection

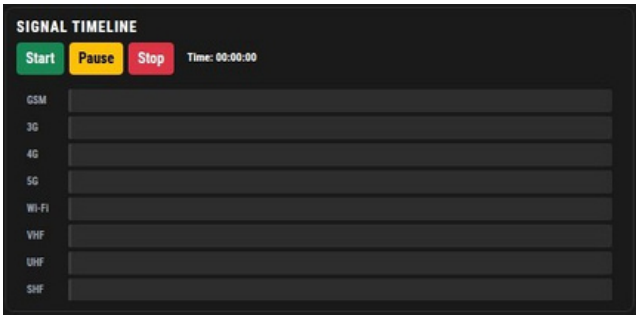
Touch a visible spike to view its approximate frequency and signal-strength reading.



Bar view: strength by signal band.



Graph view: power across frequency.



Record view tracks activity by band.



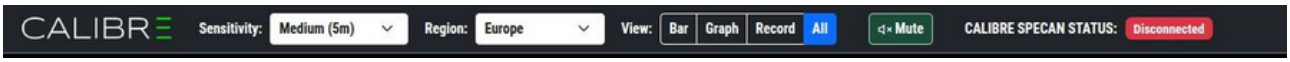
Waterfall view builds a time history.

INSTRUCTIONS

OPERATION

When the device is powered on, it will begin to operate on the Wi-Fi / Bluetooth bandwidth. To change this, select which bandwidth you would like to monitor by touching either “CELLULAR” or “WIDEBAND”.

In “CELLULAR” mode, you will notice a gap in the graph. This is where because cellular ranges operate on both sides of the Bluetooth and Wi-Fi bandwidth. The gap is designed to block out readings that fall within the Bluetooth and Wi-Fi range and allow the user to observe the whole cellular spectrum.



The “SENSITIVITY” button will adjust the receiving strength (Rx) of the device. It has three settings; minimum, medium and high which are displayed in the status panel at the top right hand side of the screen as “MIN”, “MED” and “HIGH” respectively.

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INSTRUCTIONS

OPERATION

The operator is unlikely to have their eyes fixated on the screen during a monitoring period. It is for that reason that the “RECORD'' function exists. This will highlight any spikes in RF activity to the user within the 45 minute period.

The waterfall feature provides an alternative display to the graph. Set to blue by default, it will show any recent spikes along with their pattern (if any). If, for example, a strong signal is pulsing, the waterfall will show orange or yellow dots in line with one another in a vertical fashion. The stronger the signal, the lighter the colour.

If a reading is shown and the user would like to know the exact frequency and/ or strength, they can touch the screen where the spike is and the reading details will be shown on the screen.

The “WIDEBAND” function will analyse all frequencies within the Specan’s range (0-6GHz).

INSTRUCTIONS

IF THE DEVICE IS NOT RESPONDING

1. Turn the device off using **two quick presses** of the physical power switch.

2. Wait briefly, then press the switch once to restart.

3. If the problem continues, stop using the unit and contact support.

DO NOT

Do not repeatedly cycle the power if the device continues to fail during startup.

Do not open the enclosure or attempt to access internal components.

Do not attempt to reinstall or modify the SPECAN TOUCH 2 firmware unless instructed by CALIBRE support.

MAINTANENCE

GENERAL CARE

Keep the touchscreen and thermal imaging window clean and free from dust, fingerprints and other contamination.

Use only a soft microfibre cloth when cleaning optical or display surfaces.

Do not use abrasive cleaning products, solvents or excessive moisture. Where possible, store the SPECAN TOUCH 2 within its protective case when it is not in use.

Charge the device periodically during extended periods of storage to help maintain battery condition.

SUPPORT

If it appears that the device is not functioning properly, shut the device down following the correct procedure and turn it on again.

If the problem persists, please email us info@Calibre-Defence.com and someone will respond to you within 24-48 hours.

WARRANTY

COVER

All Calibre products are covered by a 12-month warranty from the date of purchase. The warranty covers manufacturing defects and faults in materials. It does not cover damage resulting from misuse, accidental damage, or normal wear and tear. To claim warranty service, please provide proof of purchase and a detailed description of the issue. If the product is found to be defective under normal use, it will be repaired or replaced at no additional cost. This warranty does not affect your statutory rights.

For more information, please contact our customer service team.