SENSITECH
COLD CHAIN VISIBILITY

USER MANUAL

For

TTGEO X, Air Temperature Tracker Non-Lithium   **(T11013210)**
TTGEO XE, Air Temperature Tracker, Extended   **(T11013220)**
TTGEO XP, Air Probe Temperature Tracker, Non-Lithium   **(T11013230)**
TTGEO XEP, Air Probe Temperature Tracker, Extended   **(T11013240)**

NOTICE OF PROPRIETARY PROPERTY

REVISION HISTORY:

REV	DESCRIPTION	DWN	APVD	DATE
1	Initial Release	JZL	TNS	03MAY23
2	Update with BLE/WIFI Info	JZL	TNS	04MAYG23
3	Deleted Importer words	MVM	MVM	16AUG23
4	Updated :	MVM	MVM	19SEP23
	Added Model numbers on the top page			
	Updated the TIS /TRP to passed			
	FCC/CE/IC – deleted pending			
	Updated Applicant Name and Manufacturing site			
	Updated Operating frequencies of BG95 per data sheet			
	Updated caution notice under Clause 5 - Disclaimers			
5	Added FCC and ISED Bands only under 1.4.1 a	MVM	MVM	05OCT23

Table of Contents

1.   Introduction

1.1.   Purpose

This document describes the usage of a TEMPTALE GEO X, XE and TEMPTALE GEO XP/XEP devices.

1.2.   Scope

The intended audience is a valued customer.

1.3.   Description

The Devices are a LTE-M/2G GSM Quad band tracking device, and sensor data logger designed for the transportation industry. It is primarily intended to be used as a real time position-monitoring device, which will also produce accurate temperature and humidity. Specific variants of the device also uses various sensors to detect when the aircraft has taken off and when it has landed to disable/enable the cellular modem.

The following is a brief summary of its features:

1.   LTE-M/2G GSM Quad Band
2.   Cellular/Wi-Fi Location
3.   Internal battery
4.   Accelerometer (optional)
5.   Temperature Sensor
6.   Humidity Sensor
7.   Light Sensor
8.   Pressure Sensor (optional)
9.   BLE for secondary download
10.   Dry Ice Probe (optional)
11.   User Interface

Applicant Information

Company Name: Sensitech Inc

Address : 800 Cummings Center # 258X, Beverly, MA 01915

Manufacturer Information

Company Name: Team Precision Public Company Limited in behalf ot Sensitech Inc

Address: 198 Moo 13, Suwansom Rd. Dong-Khee-Lek, Amphur Muang Prachinburri 25000, Thailand

1.4. Radio Frequency Characteristics

1.4.1. Operating Frequencies

Cat M1:

B1/B2/B3/B4/B5/B8/

B12/B13/B18/B19/B20/

B25/B26/B27/B28/B66/

B85

GSM: GSM850/900/1800/1900

WIFI/BLE: 2.4 GHz

1.4.1 a.) FCC/ISED Band ONLY are listed BELOW:

GSM: GSM850/1900

LTE CAT-M1: B2/B4/B5/B12/B13/B25/B26/B66/B85

Wi-Fi 2.4GHz/BLE

1.4.2. TRP/TIS

Cellular Maximum Conducted TRP: PASSED

Cellular Minimum Conducted TIS: PASSED

As Per Official REPORT: TEOT2306000419EP
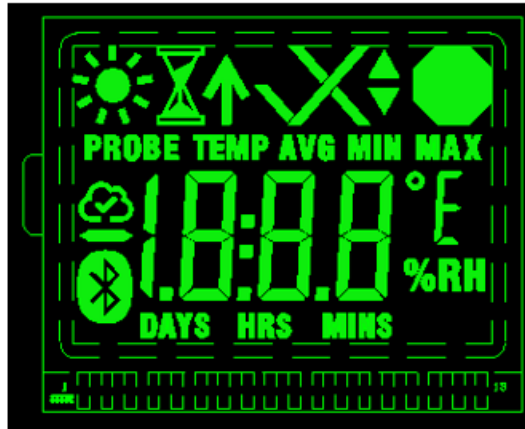
2.   Physical Appearance

2.1.   User Interface

The user interface consists of the following:

1. Segmented LCD
2. Two buttons(Start/Stop)

2.1.1. LCD

There is a LCD on the device:

2.1.2. Buttons

There are two buttons on the device:

1. Start – a configurable press delay is added, usually configured to be held for three second before it starts.
2. Stop – a configurable press delay is added, usually configured to be held for three second before it stops.

3. Using the Device

3.1. Starting the device:

To start the device, press the START button. If the Start Key feature is enabled, the START button must be held down for 3 seconds. The device may only be started from sleep mode.

3.2. Stopping the device:

To stop the device, press the START button. If the Stop Key feature is enabled, the START button must be held down for 5 seconds to stop.

3.3. Secondary Download / BLE Functionality

BLE is used once the device enters the stopped state. To download the device data perform the following:

1. Press and Hold the Start/Stop Button for 10 seconds
2. The BLE Icon will display on the LCD
3. Open TempTale Mobile App
4. Search the monitor by serial number
5. Press the download icon

3.4. WIFI Functionality

Wi-Fi is used while the device is started and in the run state. Wifi is during reporting intervals as a "Sniffer" or Passive scanning to scan for nearby AP's (Access Points). Sensitech Software then performs location trilateration to get a fix point. The Wi-Fi capability is limited to this functionality/ use only and will not attempt connect to a Wi-Fi network.

4. <u>Software</u>

This unit reports data over the cellular network.   This data is accessible via several web-based platforms that target various industries.   Please contact customer support for more information.

5. <u>Disclaimers</u>

⚠️	Risk of Fire Hazard if battery is not charged in accordance with manufacturer's instruction.
	RISK OF EXPLOSION IF BATTERY IS REPLACED BY AN INCORRECT TYPE. DISPOSE OF USED BATTERIES ACCORDING TO THE INSTRUCTIONS
	Do not dispose battery along with household waste.
	There are no user serviceable parts inside, battery cannot be replaced by the end user, and will result in damaging device.
	To comply with FCC/IC RF exposure limits for general population / uncontrolled exposure, the antenna(s) used for this transmitter must be installed to provide a separation distance of at least 20 cm from all persons and must not be co-located or operating in conjunction with any other antenna or transmitter as per RSS102 requirements

Attention: exposition au rayonnement radiofréquence.

1.   Pour se conformer aux exigences de conformité RF canadienne l'exposition, cet appareil et son antenne ne doivent pas être co-localisés ou fonctionnant en conjonction avec une autre antenne ou transmetteur.

2.   Pour se conformer aux exigences de conformité CNR 102 RF exposition, une distance de séparation d'au moins 20 cm doit être maintenue entre l'antenne de cet appareil et toutes les personnes. |

5.1.   FCC

Federal Communications Commission (FCC) Statement

15.21
You are cautioned that changes or modifications not expressly approved by the part responsible for compliance could void the user's authority to operate the equipment.

15.105(b)

This equipment has been tested and found to comply with the limits for a Class B digital device, pursuant to part 15 of the FCC rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation.

This equipment generates, uses and can radiate radio frequency energy and, if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation. If this equipment does cause harmful interference to radio or television reception, which can be determined by turning the equipment off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

-Reorient or relocate the receiving antenna.

-Increase the separation between the equipment and receiver.

-Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.

-Consult the dealer or an experienced radio/TV technician for help.

15.19

This device complies with Part 15 of the FCC Rules.

Operation is subject to the following two conditions:

1) this device may not cause harmful interference and

2) this device must accept any interference received, including interference that may cause undesired operation of the device.

5.2. IC

5.2.1. Canadian Notice

This device contains licence-exempt transmitter(s)/receiver(s) that comply with Innovation, Science and Economic Development Canada's licence-exempt RSS(s). Operation is subject to the following two conditions:

1. This device may not cause interference.

2. This device must accept any interference, including interference that may cause undesired operation of the device.

5.2.2. Avis Canadien

L'émetteur/récepteur exempt de licence contenu dans le présent appareil est conforme aux CNR d'Innovation, Sciences et Développement économique Canada applicables aux appareils radio exempts de licence. L'exploitation est autorisée aux deux conditions suivantes :

1. L'appareil ne doit pas produire de brouillage;

2. L'appareil doit accepter tout brouillage radioélectrique subi, même si le brouillage est susceptible d'en compromettre le fonctionnement.

5.3. CE

Hereby, Sensitech declares that the radio equipment type LTE CAT-M/2G GSM/GPRS Tracking Device is in compliance with Directive 2014/53/EU. The full text of the EU declaration of conformity is available upon request.

5.4. Brazil - pending

"Este equipamento não tem direito à proteção contra interferência prejudicial e não pode causar interferência em sistemas devidamente autorizados"

Anatel ID: TBD

Modem: Quectel BG-96

5.5. NOM - pending

La operación de este equipo está sujeta a las siguientes dos condiciones: (1) es posible que este equipo o dispositivo no cause interferencia perjudicial y (2) este equipo o dispositivo debe aceptar cualquier interferencia, incluyendo la que pueda causar su operación no deseada.

Número IFETEL: TBD