



EnTire Solutions, LLC
 24175 Research Drive
 Farmington Hills, Mi 48335

RE: Certification for EnTire Solutions, LLC TPM Aftermarket Sensor

Model #: 218898-101 (High Line Short Valve Stem)
 218898-102 (High Line Long Valve Stem)
 218898-103 (Base Line Short Valve Stem)
 FCC ID: T7B-2T
 Canada IC: IC6484A-2T

GENERAL DESCRIPTION

This transmitter is a transmitter device with tire valve, which is mounted in the valve hole of the wheel rim and transmits the pressure and temperature inside the tire, the battery voltage of the transmitter, and the tire identification code (ID) at normal and abnormal condition with the radio wave (RF) that conforms to the used area. Also this device has a countermeasure function such as the random delay of transmission time so that the RF signal from each tire will not interfere such as due to the simultaneous transmission. The transmitter device also has a Low Frequency (LF) receiver. This receiver supports Low Frequency (LF) magnetic field communications allowing the changing of measurement/monitoring states of the transmitter by commands sent via the wheel-arch mounted TPMS Initiator (LF transmitter). The RF signal operates at 315MHz and uses ASK bi-phase modulation. Only difference between 218898-101/102 and 218898-103 is that in -103 two different RF packages are sent one after the other every 1 min 40 sec, while in -101/102 the same RF package is sent every 1 minute. The 218898-103 features the “short” v-stem. There are no differences in components or function.

Description of Operations

P/N	Consumer's Use Mode	Mfg. Modes	Mode of Operation	Explanation	Frequency of Transmission
-101, -102, -103	X		Storage Mode	No transmission. Measures temperature and pressure.	8 words whenever LF activation occurs
-101, -102	X		Normal Mode	Measures temperature and pressure. Transmits periodically. Enters this mode from storage when pressure goes above threshold.	4 words every 1 minute, 8 words LF activation occurs
-103	X		Normal Mode	Measures temperature and pressure. Transmits periodically. Enters this mode from storage when pressure goes above threshold.	4 words every 1 minute and 40 seconds, 8 words LF activation occurs
-101, -102, -103	X		Alert Mode	Transmits when: a) significant pressure delta detected b) high temperature is detected	8 words every 4 seconds for 1 minute
-101, -102, -103		X	Mfg. Mode	Used to test soldering on LF coils.	4 words whenever LF activation occurs