

MEMS Truck Mounted Module Description

The MEMS (Michelin Earthmover Management system) Receiver is a vehicle mounted device used to receive and process signals generated by MEMS tire sensor tags. Data from sensors in multiple tires is accumulated, and sent periodically, or on demand, to external customer terminal equipment, via an RS232 interface. Two independent antenna and radio receiver circuits are used to support reception via dipole antennae on both sides of large trucks. The unit is equipped with a transmitter, that supports transmission of tire air pressure and temperature data to a hand-held service tool (MEMS HHU – hand-held-unit). The transmissions are 433.92 MHz, FSK modulated signals that are connected to one of the two antennae, via an internal RF switch. All radio transmissions from the Receiver are in response to information requests initiated by the operator of an HHU.