# 2024 Race Technology RTSS Product and installation information

Real Time Power Logging Scrutineering System





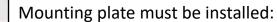
## New for 2024 - Car installation kit

Compulsory installation kit must be purchased and installed prior to scrutineering checks.

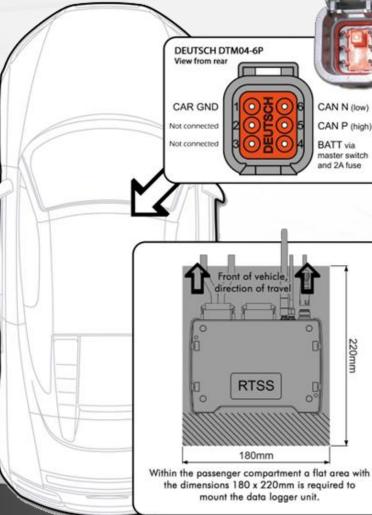
Installation kit costs £50+VAT.

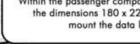
#### Car installation kit includes:

- Deutsch DTM04-6P connector
- 4\* DTM male contacts
- Mounting bracket
- GNSS (GPS+GLONASS) antenna
- 1-meter 0.5mm high temp automotive wire



- Mounted in an area to allow rapid installation
- Mounted within 0.5m of the DTM06-4P connector
- Mounted flat and level
- Mounted squarely in the direction of travel











### **Installation information - GPS**

# **Mounting GPS antenna instructions**



For correct, accurate operation of the GPS receiver it is absolutely essential that the antenna is mounted correctly. There are several important aspects to consider when mounting it:

The antenna must have a clear view of the sky in all directions. Note that it is NOT enough that the antenna can see vertically upwards towards the sky, it must also be able to see all the horizons as well. The GPS system gets very little positional or speed information from the satellites directly above, it gets far more information from satellites on or near the horizon. For example if the antenna was mounted in the bottom of a "bucket", so it could upwards but no horizons, then the GPS system would lock and provide positional information - but the accuracy would be very poor. In practice this all means that the antenna should be mounted on the highest point of the vehicle.

#### Some characteristics of the systems are:

- Total weight for system = 1300 grams
- The maximum temperature for the correct working of the logger is 60 degrees Celsius. An indicator on the unit will indicate the maximum temperature the unit has reached.







## **Technical Scrutineering - Power Logging**

Using the new high accuracy GPS data, the software can generate power figures with just a few laps of information.

The system corrects for ambient conditions, track gradient and other effects. Power is calculated, along with its statistical accuracy.

