

# TRAFFIC MONITORING FOR NATIONAL ROADS AUTHORITY – IRELAND



Q-Free, in collaboration with Electro Automation, supplied an award-winning ITS solution to monitor, store and communicate 'vehicle by vehicle' traffic data across the whole NRA Road Network and back to the client's real-time installation.

The main objective was to expand the traffic-monitoring sites across the NRA Road Monitoring Network and deliver system architecture that could operate on alternative power sources when a mains supply were not already in place (wind or solar power, for example). Q-Free's HI-TRAC® TMU2 provided the solution. A total of 280 traffic monitoring sites were deployed as part of a major overhaul of the existing monitoring network.

This involved refurbishing the existing traffic-monitoring units. The HI-TRAC® TMU2 was modelled on the field-proven EMU2 Counter Classifier and is a multi-functional 19" rack based 16 Loop Counter Classifier with an extremely low power consumption.

It comes with 32Mb Flash on-board memory, 8GB micro SD memory, remotely-upgradeable firmware and Bluetooth MAC Antenna interface for journey time applications. The system also has user-configurable fault-monitoring and alert conditions which are automatically reported back to the installation. These include power failure, low battery voltage, loop/sensor fault, component failure, real-time clock fault, communications error and conflicting lane usage. To supplement this comprehensive road traffic data network, we also supplied six of our HI-TRAC® TMU4 Weigh-in-Motion (WIM) Systems. These have a long and exceptional track record, having been installed in many countries across the world. The weight data is being combined with Automatic Number Plate Recognition (ANPR) for vehicle weight enforcement purposes.

