**Objective**

Train Detection Compatibility (TDC) defines the specifications of all Electro Magnetic Compatibility (EMC) issues related to interface parameters. This applies in particular to all compatibility issues related to train detection systems. These range, among others, from electromagnetic effects caused by traction and track circuits, sanding problems for track circuits, eddy current brakes, to more general frequency management issues of rolling stock. Train detection compatibility is defined in the Regulation (EU) 2016/919 on the Technical Specification for Interoperability relating to the Control-Command and Signalling (TSI CCS).

**Involvement of Infrastructure Managers**

The IMs are responsible to ensure “Reliability, Availability, Maintainability and Safety” (RAMS) of their infrastructure. IMs are actively involved in this matter as they manage the EMC and the “immunity” of the signalling and telecommunications systems of their infrastructure with the emissions/frequencies of the rolling stock.

**EIM in action**

- EIM's Train Detection Compatibility Working Group (TDC WG) works in cooperation with CER, notably on EMC compliance of track circuits, frequency management and migration;
- EIM advocates to improve compatibility in the CCS TSI by extending its scope to non-standard gauges.