openETCS

ITEA 2
INFORMATION TECHNOLOGY FOR EUROPEAN ADVANCEMENT

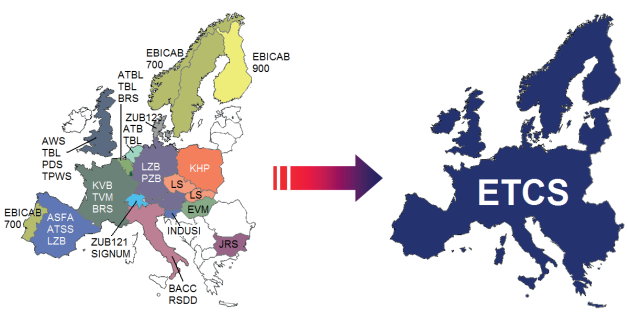
European Train Control System
Open Proofs - Open Source

openETCS aims at developing an integrated modeling, development, validation and testing framework for leveraging the cost-efficient and reliable implementation of the European Train Control System (ETCS).

The project employs open standards on all levels, including hardware and software specification, interface definition, design tools, verification and validation procedures and last but not least embedded control software.

The vision

The goal of ETCS is the unification of the European rail network allowing train operators to use a rail vehicle equipped with a single signalling system to operate throughout Europe.



The reality

Real interoperability between different implementations of ETCS and their track side counterparts is not yet achieved. The reason is the „human factor“ in interpreting the standards. Furthermore, the migration costs from national systems to ETCS are high.

The solution

Transfering the ETCS specification into a formal model and then generating the code for an ETCS onboard unit will help to overcome interoperability problems. This avoids ambiguities and divergent interpretation of verbal language specifications, thereby enabling a vendor-neutral reference implementation.

Consortium

29 partners - 7 countries - 1 project
www.openetcs.org

Belgium
ALSTOM
ERTMS Solutions

France
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