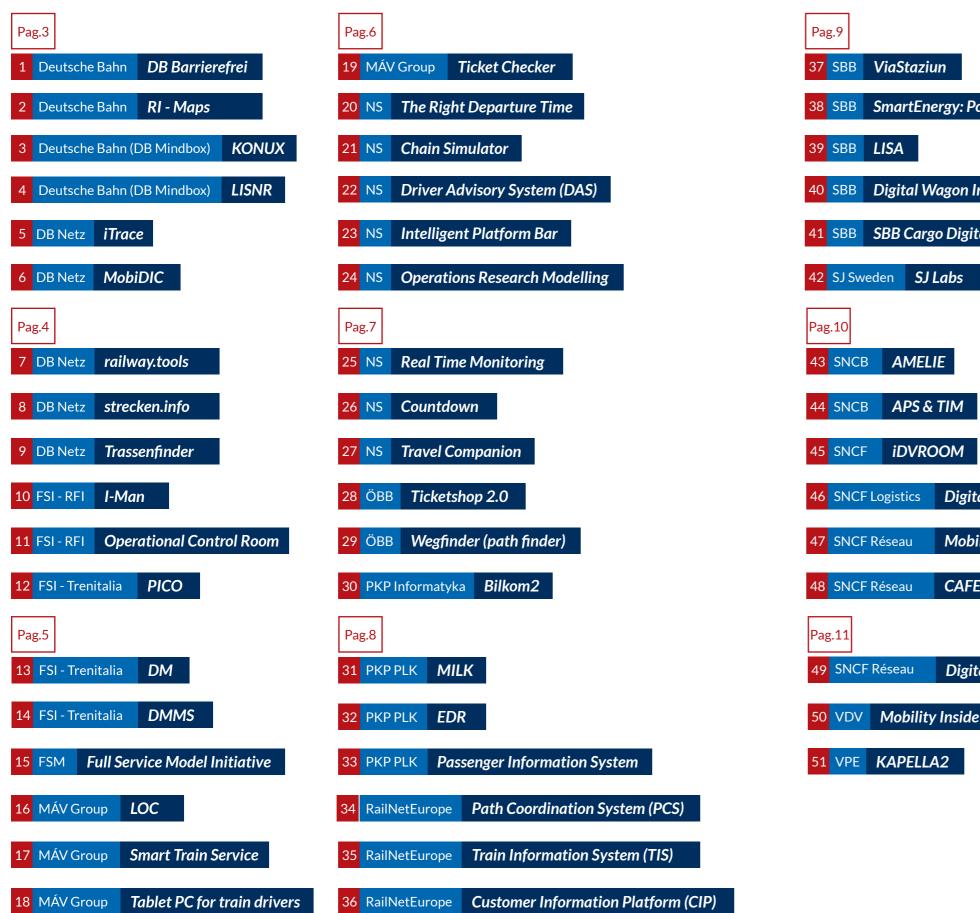


#Rail4Digital List of Products



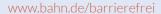
38 SBB SmartEnergy: Power Demand Management at SBB 40 SBB Digital Wagon Inspection 41 SBB SBB Cargo Digital Digital Freight Train Mobile & Smart Maintenance CAFEINE Digital Open Lab 50 VDV Mobility Inside





1 Deutsche Bahn DB Barrierefrei

A new app for travellers with cognitive, physical or sensorial handicaps but also for any other traveller who wants to get current information about train connections, schedules, elevators and more





2 Deutsche Bahn

RI - Maps

A mapping service that helps customers navigate inside and around stations



3 Deutsche Bahn (DB Mindbox)

KONUX

System to analyse the condition and wear of switches, helping to optimise maintenance planning

www.konux.com



4 Deutsche Bahn (DB Mindbox)

LISNR

Software allowing devices to connect and send data using sound

www.lisnr.com



5 DB Netz

iTrace

Internal platform for more transparent and effective management of infrastructure development

www.einfachbahn.de



6 DB Netz

MobiDIC

Modular low-cost sensor system for continuous monitoring of railway infrastructure







7 DB Netz

railway.tools

Information portal for combined transport. Web-based EU map with simple search for CT terminals, operators, loading points and service stations – detailed info on selected terminals, trains and connections



www.railway.tools

8 DB Netz

strecken.info

Web-based interactive map showing relevant infrastructure restrictions affecting railway undertakings

www.strecken.info



9 DB Netz

Trassenfinder

"Google Maps for rail" enabling to find routes easily and quickly

www.trassenfinder.de



10 FSI - RFI

I-Man

Web-based maintenance management system allowing to manage and report easily on daily operations



11 FSI - RFI

Operational Control Room

System for management and improvement in mitigating particular events and large-scale service disruptions



12 FSI - Trenitalia

PICO

Centralised open platform that provides complete coverage of ticketing and reservation processes







13 FSI - Trenitalia

DM

Digital Maintenance – system covering the train maintenance process in a workshop plant through the use of a single integrated platform



14 FSI - Trenitalia

DMMS

Dynamic Maintenance Management System combining the internet of things with analytics and in-memory computing to analyse data from sensors aboard trains



15 FSM

Full Service Model Initiative

An interoperable plug-and-play online interface that facilitates the exchange of ticketing data between railways and ticket vendors

https://tsga.eu/fsm



16 MÁV Group

LOC

On-board system for monitoring and tracking the operational state of locomotives



17 MÁV Group

Smart Train Service

Multimedia, entertainment and training possibilities via an on-board wireless network

www.okosvonat.hu



18 MÁV Group

Tablet PC for train drivers

Tablet PC allowing to completely replace paper-based documentation and improve the efficiency of train drivers







19 MÁV Group

Ticket Checker

App for ticket inspectors facilitating paperless documentation and communication



20 NS The Right Departure Time

Smartwatch for conductors, integrating atomic time and relevant process information, to help achieve scheduled departure time



21 NS **Chain Simulator**

Simulator allowing multiple operators to experience future scenarios with an integral view of the operational control chain. To be used for research and training



Driver Advisory System (DAS)

Tablet enabling train drivers to see where their trains are located, which traffic occupies their scheduled routes and whether they are driving in an energy-efficient manner



23 NS **Intelligent Platform Bar**

A LED strip along the platform showing the train composition before it arrives (positioning of doors, coach class, toilets, bike areas...); improves the spreading of passengers across trains, speeds up the departure process



NS **Operations Research Modelling**

Mathematical models developed to achieve optimal efficiency of resources (such as infrastructure, rolling stock and train personnel) and integrated into a collection of systems able to build a completely new railway scheduling plan within 18 hours







25 NS Real Time Monitoring

Real-time processing of diagnostic, measurement and event data from trains for improvement of maintenance planning and condition-based maintenance



26 NS Countdown

Tool showing train conductors the remaining time until the closure of a level crossing, reducing waiting time



27 NS Travel Companion

App supporting customers using a form of public transport in their door-to-door journey with real-time, personal and contextually relevant information

https://www.ns.nl/en/travel-information/ns-on-your-mobile/travel-planner-xtra.html



28 ÖBB Ticketshop 2.0

Multi-channel solution for all sales channels

https://tickets.oebb.at/en/ticket



29 ÖBB Wegfinder (path finder)

Multimodal route planner for public transport, bike/car sharing, Uber, taxis, long-distance buses, including purchasing possibility

https://wegfinder.at



30 PKP Informatyka **Bilkom2**

Service that allows to buy tickets for different railway carriers online







31 PKP PLK MILK

Interactive map of railway lines - geographical information system

http://mapa.plk-sa.pl



32 PKP PLK **EDR**

Electronic railway traffic journal for stations, including current information on train operations and replacing paper documentation



33 PKP PLK **Passenger Information System**

Customer-oriented app for journey planning and booking

https://portalpasazera.pl



Path Coordination System (PCS) 34 RailNetEurope

Online application for the harmonisation of international timetables, path requests, and train compositions





Train Information System (TIS) RailNetEurope

Real-time online application for international train management

http://tis.rne.eu/

http://tis.rne.eu/index.php/data-exchange-function.html



36 RailNetEurope **Customer Information Platform (CIP)**

Online application providing harmonised information on rail freight corridors

https://cip.rne.eu/







Online resource to help persons with reduced mobility move independently in stations thanks to crowdsourced pictures

https://viastaziun.ch/station/select http://www.sbb.ch/cer2018



38 SBB SmartEnergy: Power Demand Management at SBB

An initial step towards Smart Grid management by using a high performance IT system to identify developing peaks, selecting appropriate thermic energy consumers and switching them off for a short period of time

https://www.sbbrcs.ch/en/http://www.sbb.ch/cer2018



39 SBB LISA

Light Integrated Shunting Accessory – fully GSM-R-based device for shunting communication



40 SBB Digital Wagon Inspection

Data-based testing regime for rail freight cars with wayside technology

http://www.sbb.ch/cer2018



41 SBB SBB Cargo Digital

Cargo Check-in, Cargo View and Cargo API – group of products to decrease susceptibility to errors during shipment check-in and provide transparency and seamless connectivity for customers

https://www.sbbcargo.com/de/kundencenter/e-services/sbb-cargo-digital.html http://www.sbb.ch/cer2018



42 SJ Sweden SJ Labs

Collaborative way of involving SJ's customers in its product and service development processes using new technologies to solve old challenges

https://www.youtube.com/watch?v=ieREC-gPcNQ&t=156s https://www.sj.se/sv/om/om-sj/sj-labs.html







43 SNCB

AMELIE

Automatic analysis of train-recorder data to achieve 100% control of train drivers' behaviour



44 SNCB

APS & TIM

APS - new planning system integrating information on rolling stock, local operations, train drivers, train guards and station personnel

TIM - Time Integrated Maintenance for rolling stock - dynamic use of short free scheduling slots instead of stopping operation for a day



45 SNCF

iDVROOM

Short-distance carpooling solution designed as a complement to public transportation

www.idvroom.com



46 SNCF Logistics

Digital Freight Train

Innovative connected ecosystem tailor-made for rail freight, paving the way for a new generation of data-emitting digital freight trains. Developed in partnership with Traxens



http://vimeo.com/traxens/DigitalFreightTrain

SNCF Réseau

Mobile & Smart Maintenance

Several ongoing initiatives looking at how to use digital technologies to improve end-to-end maintenance and implement predictive maintenance

https://www.digital.sncf.com/actualites/vivasncf-la-maintenance-de-demain-sera-connectee



SNCF Réseau

CAFEINE

Real-time video detection of defects on pantographs, using artificial neural networks, in order to prevent major breakdowns and improve tracking of the pantographs' evolution

https://www.digital.sncf.com/actualites/le-deep-learning-la-cle-de-lia







49 SNCF Réseau

Digital Open Lab

A testing site for rail companies, set up in partnership with the French railway industries association (FIF), to co-develop the solutions of tomorrow starting with IoT solutions

https://www.sncf-reseau.fr/fr/actualite/autre/digital-open-lab-une-ambition-collective-pouraccelerer-la-transformation-digitale



50 VDV

Mobility Inside

Vision to integrate German public transport into one intermodal platform. For customers, this means access to the whole German mobility market with only one registration and one ticket

VDV Die Verkehrs-

www.mobilityinside.de

VPE

KAPELLA2

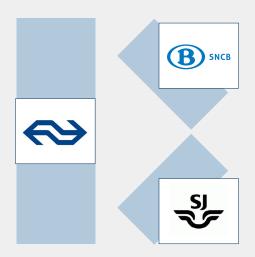
A new generation, web-based, platform-free, complex rail capacity allocation tool. Handling ad-hoc and yearly requests, posessions with automatic request type detection. Based on a highly detailed and validity treated master database



https://www.kapella2.hu



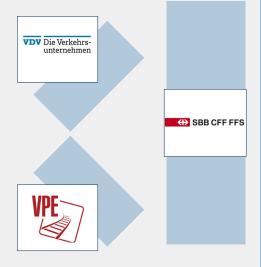


















The Voice of European Railways

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