IVU.rail at NEB





EFFICIENT PLANNING AND DISPATCHING WITH GROWING OPERATING CAPACITY



INITIAL SITUATION

Lines increase from 2 to 10, and railcars from 10 to 33 – Niederbarnim Railways (NEB) triples its operating capacity in just 3 years. This presents new challenges for the planners and dispatchers at NEB: a larger vehicle fleet, more locomotive engineers and the decentralisation of deployment locations associated with the expansion of operations must be taken into account. Previously, NEB used conventional spreadsheet software for this: an unsuitable solution for complex, decentralised operations. In addition, new forms of communication between dispatcher and crew staff are needed.

OVERVIEW

215 engine drivers and service attendants
10 (by 12/2015: 33) railcars
1.72 million (by 12/2015: 5.7 million) train kilometres per year
Regional rail services
Integrated planning of rail services and, in particular, staff deployment with a single system Planning of more operating capacity with the same number of planners/ dispatcher
Use of the employee portal
IVU.timetable, IVU.run, IVU.duty, IVU.vehicle, IVU.crew, IVU.pad

OBJECTIVES

Handling the threefold rise in operating capacity with the same number of planners and dispatchers requires a software system that maps vehicle and staff planning alike. In addition, this solution should keep up with growth in operations while being cost effective and quickly implemented. Therefore NEB looked for a

market-proven standard software that can be integrated in the existing system landscape via standard interfaces.

SOLUTION

NEB opted to introduce IVU.rail for planning and dispatching of its resources. As a fully integrated solution, IVU.rail replaces the former spreadsheet-based planning. With the products IVU.run, IVU.duty, IVU.crew and IVU.vehicle, timetable planning and the planning and dispatching of vehicles and staff can be performed quickly, flexibly and in a resource-efficient manner in one single system.

In addition, in IVU.pad.employee, NEB has a suitable solution for reliable communication between dispatchers and decentralised train staff. All drivers and train attendants are equipped with a mobile device. Via the employee portal, the crew staff have access to all information regarding duties, absences and payslips, and can report directly to the dispatcher. Paper printouts are just as unnecessary as stationary terminals for reporting for duty. At all times, up-to-date information is where it is needed: with the crew staff.



With the IVU.crew.mobile employee portal, NEB employees can also view staff rosters on the move.

Via standard interfaces in RailML format, IVU.rail enables fast exchange of data between upstream and downstream systems.

OUTCOME

IVU.rail enables NEB to meet the complex requirements of vastly expanded, decentralised regional railway operations, ultimately with 11 lines, with the same number of planning and dispatching employees. In future, the existing team of planners and dispatchers will prepare staff rosters for 215 drivers and train attendants.

The integrated solution comprising planning and dispatching software and the use of web access are increasing operational efficiency as well as employee satisfaction.