

IVU.suite at PostBus

AN INTEGRATED PLANNING AND DISPATCHING SYSTEM FOR TEN OPERATING REGIONS



INITIAL SITUATION

PostBus and its three-tone horn are part of Switzerland's cultural identity, and it is also the country's leading public bus company. With over 4,000 employees and more than 2,200 vehicles, its yellow buses carry around 150 million passengers over 117 million kilometres every year. To schedule and deploy vehicles and personnel, PostBus had previously used a software solution that was developed in the late 1990s especially for the company, but had since become outdated. The planning process was largely decentralised: a total of 16 planning centres in ten operating regions created the corresponding vehicle workings and duty schedules for driving personnel. Each region had its own working procedures that had evolved over time and were adapted to local circumstances.

OVERVIEW

Employees	4,000
Vehicles	2,200
Transport Services	152 million passengers per year, 117 million vehicle kilometres
Operations	Regional and urban bus transport
Objectives	Redevelopment of planning Standardising processes Efficiency gains Securing competitiveness
Specific Details	Several operating regions with differing processes Automatic Personnel Dispatch in regional transport Establishment of centralised processes and technical leadership Linguistic diversity of regions

IVU.SUITE PRODUCTS IN USE AT POSTBUS

SERVICE PLANNING	RESOURCE PLANNING	DISPATCHING	FLEET MANAGEMENT	TICKETING	PASSENGER INFORMATION	CONTROLLING
IVU.timetable	IVU.run	IVU.vehicle	IVU.fleet	IVU.fare	IVU.realtime	IVU.control
IVU.pool	IVU.duty	IVU.crew	IVU.cockpit	IVU.ticket	IVU.journey	
		IVU.pad	IVU.box	IVU.validator		

OBJECTIVES

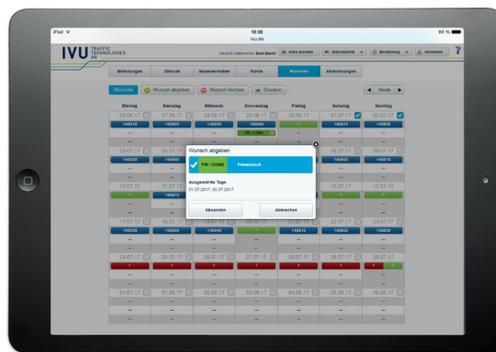
In light of increasing competition in the Swiss public transport market, PostBus envisaged not only a redevelopment of its planning system but also an overhaul of its existing structures. Processes were to be standardised across Switzerland and unified for all regions. This included new, clearer definitions of planners' and dispatchers' roles as well as the establishment of centralised technical leadership. The subsequent use of optimisation algorithms was also envisaged. PostBus expected to achieve improved working procedures and significant gains in efficiency, with the resulting lower costs helping to secure the future competitiveness of the company.

SOLUTION

After a two year market study and tendering phase, PostBus decided to use **IVU.suite** to deploy an established standard system that could be implemented without the need for any customised development. The Swiss company received a **standardised solution for all planning and dispatching tasks** with the products **IVU.timetable**, **IVU.run**, **IVU.duty**, **IVU.crew** and **IVU.vehicle** – including the administration of stops and timetable planning, vehicle scheduling, duty scheduling and vehicle and personnel dispatch. Numerous interfaces ensure that the IVU software seamlessly connects to the surrounding systems, as well as to PostBus' reporting system and quality control.

PostBus, with its comprehensive route network, will benefit in particular from the **Integrated Duty and Vehicle Scheduling (IDV)**. The system synchronises the vehicle's run times with possible breaks and reliefs for drivers and thus provides efficient and resource-saving vehicle runs and duties. Furthermore, the **Automatic Personnel Dispatch (APD)** allows the creation of balanced and fair duty schedules for drivers. It also supports the standardisation of processes across all operating regions. Due to its flexible and editable rule system, it automatically takes individual circumstances for payroll rules and working agreements into account based on central

guidelines. PostBus is also gaining a system for more inclusive engagement of driving personnel in scheduling, thanks to **IVU.pad.employee**. In the future, drivers will be able to view duties on tablets via a browser-based **employee portal** and will also be able to send requests to the dispatch.



With IVU.pad.employee, driving personnel will be able to access duties and send requests from anywhere.

OUTCOME

Through their use of IVU.suite, PostBus has been able to establish a Switzerland-wide process and system infrastructure for integrated planning and dispatching of vehicles and personnel. Conditions that vary across regions are comprehensively covered by the standard solution and no additional development efforts were required in the core system. Both planning processes and planning quality have improved thanks to the IVU solution. A foundation has been laid for the system's further development and for the subsequent introduction of the optimisation.

“IVU.suite has enabled us to roll out a solution throughout Switzerland and to establish uniform standardised processes. Nevertheless, we are still flexible where necessary. It allows us to considerably increase our efficiency, reduce our costs and thereby ensure that PostBus retains its competitiveness in the future.”

Jean-Pierre Boillat
Head of Production Projects | PostBus Switzerland