

DB upgrade and new route Karlsruhe – Basel, PAS 9.1, Schliengen – Eimeldingen 17.6 km The Open Section

The Karlsruhe – Basel track upgrade section and new section (ABS/NBS KB) form part of the main Rotterdam – Cologne – Basel – Milan – Genoa European freight corridor. This commercial transport axis connects the Dutch ports to the Mediterranean. The Karlsruhe to Basel track upgrade section and new section (ABS/NBS) is divided into 9 sections. Section 9.1 is highlighted here. The Katzenberg tunnel (9,386 meters long), the connection to the tunnel in the north and in the south by the Open Section (approximately t 8.2 km) and the electronic signal control units UZ Buggingen and the electronic signal control units A Schliengen are all in this section. The Katzenberg Tunnel connection follows the route of the old Rhine Valley Railway. This context requires the upgrade of the two-track Rhine Valley Railway to a four-track line.

The route is characterized by the following structures:

- 11 road and rail corridors in the form of single span, double span and triple span bridges
- Noise barriers L=2,900 m
- Retaining walls and embankment securing measures over a length of 2,200 m
- Earth cuttings of up to 10 meters deep



Deep connection cuts

- Earth movements from embankments, cuts and landfills: approximately 1.0 million m³ according to the overall planning concept (BoVEK)
- Station renovation at Schliengen with elevator and P&R facility construction
- Station renovation Eimeldingen with elevator and P&R facility construction



Upgrading of the Katzenberg Tunnel connection to the old Rhine Valley Railway to 4 tracks during railway operation

- Upgrading of electronic signal control units (ESTW UZ) Buggingen
- Upgrading of electronic signal control units (ESTW-A) Schliengen



Slab track in rescue areas

The Open Section services were tendered in a total of seven award packages (VP 1-3, VP A, VP B1, VP B2, VP C, VP E, VP EÜ A98). Specific organizational and coordination challenges arose as a result of the large number of interfaces.

sfirion AG was also commissioned to handle document management. the proprietary sfirion archiv software was used. To date, approximately 70,000 documents with 100,000 files have been managed.

The conversion was carried out in 10 phases during ongoing railway operation.

sfirion AG was entrusted with project management from the beginning of this construction project.

Client

DB Netz AG

Contracting authority

DB ProjektBau GmbH
Southwest Division

Reference person

Dipl.-Ing. Stefan Penn,
K-B Major Project
Manager

Dipl.-Ing. H.-G. Haid, PL

Construction time

2007 - 2014

Construction cost

approximately €710 million including Katzenberg Tunnel

Contract value

€3.5 million

Services provided by sfirion AG

Project management

- Coordination
- Organization
- Deadline and cost control
- Contract administration

Work phases

LPh 2-8