

Title (en)
METHOD FOR VITAL COUPLING OF A ROUTE-BASED PROTECTION SYSTEM AND A BLOCK-BASED PROTECTION SYSTEM, TRAIN MOVEMENT PROTECTION SYSTEM

Title (de)
VERFAHREN ZUR VITALEN KOPPLUNG EINES ROUTENBASIERTEN SCHUTZSYSTEMS UND EINES BLOCKBASIERTEN SCHUTZSYSTEMS, ZUGBEWEGUNGSSCHUTZSYSTEM

Title (fr)
PROCÉDÉ DE COUPLAGE VITAL D'UN SYSTÈME DE PROTECTION BASÉ SUR UNE VOIE ET SYSTÈME DE PROTECTION À BASE DE BLOCS, SYSTÈME DE PROTECTION DE MOUVEMENT DE TRAIN

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Application
EP 17188959 A 20170901

Priority
EP 17188959 A 20170901

Abstract (en)
A method for vital coupling of a first protection system (3) and a second protection system (5) for railway traffic on a railway track (1) wherein the first protection system (3) is a route-based protection system and comprises a route capable interlocking (2) and wherein the second protection system (5) is incompatible with the first protection system, wherein the railway track (1) comprises block protected track sections (TS1, TS2) and/or route protected track sections, wherein each track section (TS1, TS2) can assume several states, the states of the block protected track sections (TS1, TS2) being represented by line block sections (10, 11) and the states of the route protected track sections being represented by route sections is characterized in that a block adaption device (7) provides at least one route section (12) for a transition section (TS1), that at least one line block section (11) is provided for the transition section, and that the block adaption device (7) communicates with the route-capable interlocking (2) and with the second protection system at an interface (S). The inventive method enables vital coupling of a two incompatible protection systems while using a standardized interface.

IPC 8 full level
B61L 21/04 (2006.01); **B61L 19/06** (2006.01); **B61L 23/30** (2006.01); **B61L 27/00** (2006.01)

CPC (source: EP)
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Citation (applicant)

- BECKER, B., DETAILED DESIGN DOCUMENT (DDD) LINE INTERFACE (LI) OF ESTW L90 5, 4 August 2010 (2010-08-04)
- GUNTHER, P.: "Reilais- und Selbstblockanlagen Teil II Selbst-blockanlagen", 1963, JOSEF KELLER VERLAG
- GUNTHER, P.: "Relaisblockanlagen Teil I", 1965, JOSEF KELLER VERLAG
- HAUG, T., FIRMENNEUTRALE ZENTRALBLOCK-SCHNITTSTELLE, 1 February 2016 (2016-02-01)
- MASCHEK, U.: "Sicherung des Schienenverkehrs", 2013, SPRINGER FACHMEDIEN WIESBADEN
- NATTERER, R., ESTW L90 BLOCKANPASSUNGSGRUPPE, 11 March 1997 (1997-03-11)
- SCHMAL, A., SCHNITTSTELLE L90 (EAM) / EB L2000, 9 December 2009 (2009-12-09)

Citation (search report)

- [XAI] EP 3176050 A1 20170607 - HIGASHI NIPPON RYOKAKU TETSUDO [JP]
- [XAI] EP 2090492 A2 20090819 - DEUTSCHE BAHN AG [DE]

Cited by
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