

Title (en)
Concrete-free sleeper

Title (de)
Betonlose Schwelle

Title (fr)
Traverse sans béton

Publication
EP 1130162 A3 20030115 (DE)

Application
EP 01104708 A 20010226

Priority
DE 10009506 A 20000229

Abstract (en)
[origin: EP1130162A2] The sleeper (1) is mounted to a rail grid through rails (6). The grid is first aligned over a support plate (7) concreted at least partly into a track plate (14). A sleeper reinforcement (2) formed without concrete surround is provided with welded rail fixing plates (5). The sleeper reinforcement and rail fixing plate have spacer holders (3) arranged between them, where the spacer holders are formed as steel bars (4) or cases.

IPC 1-7
E01B 1/00; **E01B 3/16**

IPC 8 full level
E01B 3/32 (2006.01); **E01B 29/00** (2006.01)

CPC (source: EP)
E01B 3/32 (2013.01); **E01B 29/005** (2013.01)

Citation (search report)

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- [X] EP 0298904 A1 19890111 - SALZGITTER PEINE STAHLWERKE [DE]
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- [A] FR 2776683 A1 19991001 - SPIE BATIGNOLLES TP [FR]
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Designated contracting state (EPC)
AT BE CH CY DE DK ES FI FR GB GR IE IT LI LU MC NL PT SE TR

DOCDB simple family (publication)
EP 1130162 A2 20010905; **EP 1130162 A3 20030115**; **EP 1130162 B1 20050831**; AT E303469 T1 20050915; DE 10009506 A1 20010906; DE 10009506 B4 20080619; DE 50107240 D1 20051006; DK 1130162 T3 20060116; ES 2244507 T3 20051216; PT 1130162 E 20051130

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