

Title (en)
Support for constructions above and below ground

Title (de)
Ausbau im Hoch- und Tiefbau

Title (fr)
Soutenement pour bâtiments et travaux publics

Publication
EP 1950375 A2 20080730 (DE)

Application
EP 08002696 A 20060630

Priority

- EP 06776099 A 20060630
- DE 102005032434 A 20050709
- DE 102005038363 A 20050811
- DE 102005048118 A 20051006
- DE 102005057959 A 20051203
- DE 102005057960 A 20051203

Abstract (en)
Construction has a seal secured at the outer side against traversing water or a anchor isolation against corrosion or a film with rough surface or a claw mat or an agent for spraying concrete with enclosed plastic foam particles. The film is held by means of sealing elements at the anchoring elements.

Abstract (de)
Nach der Erfindung finden Anker und Befestiger beim Tunnelausbau Verwendung.

IPC 8 full level
E21D 11/38 (2006.01); **E21D 11/10** (2006.01); **E21D 21/00** (2006.01)

CPC (source: EP NO)
E21D 11/10 (2013.01 - NO); **E21D 11/105** (2013.01 - EP NO); **E21D 11/38** (2013.01 - NO); **E21D 11/383** (2013.01 - EP);
E21D 21/00 (2013.01 - NO)

Citation (applicant)

- DE 4100902 A1 19910829 - HUELS TROISDORF [DE]
- DE 19519595 A1 19961205 - NIEDLICH THORSTEN [DE]
- DE 8632994 U1 19870205
- DE 8701969 U1 19870402
- DE 20217044 U1 20030626 - MOHR PETER [DE]
- JP H10306695 A 19981117 - TAISEI CORP
- DE 3244000 A1 19840530 - NIEDERBERG CHEMIE [DE]
- GB 2325946 A 19981209 - OERSTA STAALINDUSTRI [NO]
- JP 2000220395 A 20000808 - BRIDGESTONE CORP
- JP H0430098 A 19920203 - KANKOU ENJINIARINGU KK
- JP H0742497 B2 19950510

Cited by
WO2019108068A2; WO2010090527A1; WO2024112209A1; EP2420648A2; EP2594736A1; DE102012012522A1; EP2837768A2

Designated contracting state (EPC)
AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HU IE IS IT LI LT LU LV MC NL PL PT RO SE SI SK TR

Designated extension state (EPC)
AL BA HR MK RS

DOCDB simple family (publication)
WO 2007006428 A2 20070118; **WO 2007006428 A3 20070329**; AT E467747 T1 20100515; DE 502006006948 D1 20100624;
DK 1950375 T3 20100705; EP 1902197 A2 20080326; EP 1950375 A2 20080730; EP 1950375 A3 20080827; EP 1950375 B1 20100512;
EP 2420648 A2 20120222; EP 2420648 A3 20130102; EP 2420648 B1 20141008; EP 2837768 A2 20150218; EP 2837768 A3 20150909;
EP 2837768 B1 20180131; ES 2341592 T3 20100622; ES 2523276 T3 20141124; ES 2659022 T3 20180313; NO 20076650 L 20071227;
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EP 2006006358 W 20060630; AT 08002696 T 20060630; DE 502006006948 T 20060630; DK 08002696 T 20060630; EP 06776099 A 20060630;
EP 08002696 A 20060630; EP 11008814 A 20060630; EP 14002660 A 20060630; ES 08002696 T 20060630; ES 11008814 T 20060630;
ES 14002660 T 20060630; NO 20076650 A 20071227; NO 20160753 A 20160504