

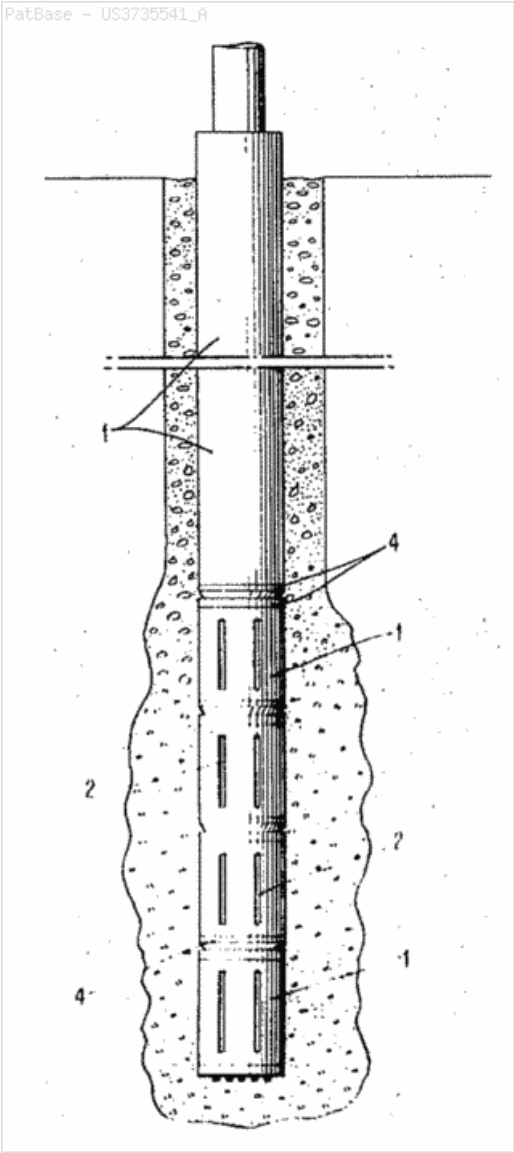
Search history

Search 1: FT=(CONSTRUCTION~ AND METHOD~ AND OF AND CEMENT~ AND ANCHOR~) (Results 26578)
Search 2: IC=(E02D) (Results 279706)
Search 3: 1 and 2 (Results 2389)
Search 4: FT=(CONSTRUCTION~ AND METHOD~ AND OF AND CEMENT~ AND ANCHOR~) and (drill machine~ AND reinforcement) (Results 42)
Search 5: drill machine "PRODUCING AN ANCHORING TIE ROD" (Results 0)
Search 6: PRODU* AND ANCHORING TIE ROD (Results 10)
Search 7: FT=(CONSTRUCTION~ AND METHOD~ AND OF AND CEMENT~ AND ANCHOR~ AND TIE ROD~ AND drill machine) (Results 37)
Search 8: 7 and 2 (Results 0)
Search 9: FT=(CONSTRUCTION~ AND CEMENT~ AND ANCHOR~ AND TIE ROD~ AND drill machine) (Results 37)
Search 10: FT=(CONSTRUCTION~ AND METHOD~ AND CEMENT~ AND ANCHORING TIE ROD~) (Results 10)
Search 11: FT=(METHOD~ AND CEMENT~ AND ANCHORING TIE ROD~) AND IC=(E02D) (Results 8)

Title: METHOD AND DEVICE FOR ANCHORING TIE-RODS IN GROUND

Abstract: A tie-rod or cable is anchored in the earth by drilling a hole in the soil or rock and placing in the hole a double-wall casing comprising spaced inner sleeves and outer sleeves. Annular spacers between successive sections of the inner and outer sleeves have longitudinal holes receiving strands or bars of the cable or the rod to be anchored. The inner and outer sleeves are weakened by longitudinal slits or cuts. Cement injected under pressure through an injection tube inserted inside the casing causes slits in the inner sleeves to open so that the cement fills the annular space containing the tie-rod or cable bars or strands and then causes bursting of the outer sleeves to fill any space surrounding the casing. Seals between the injection tube and the spacers limit the injection to one section at a time. After injection with cement, the middle of the casing is flushed out to permit subsequent reinjection.

Classifications:
International (ipc 8-9): E02D5/80 (Advanced/Invention); E02D5/80 (Core/Invention)
International (ipc 1-7): E02D5/80
CPC: E02D5/808
European: E02D5/80F
US: 405/244 405/269 411/19 52/155 52/98 D25/128



Family:

Publication number	Publication date	Application number	Application date
US3735541 A	19730529	US19710160684	19710708

Priority:

US19710160684 19710708

Probable Assignee: VANDERLINDE W
Assignee(s): (std): VANDERLINDE W
Assignee(s): VANDERLINDE W SAO PAULO BR
Inventor(s): (std): VANDERLINDE W
Inventor(s): VANDERLINDE W SAO PAULO BR

Legal status (INPADOC)

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Patent	Date recorded	Event group	Code	Event	Details
US3735541 A	19730529	LSGT	+	granted / extensions (spc, cpc, pte)	

Title: **METHOD** AND DEVICE FOR **ANCHORING TIE** RODS IN SOIL OR ROCK

Abstract: 1362843 Ground anchors P A SMITH 14 June 1971 27775/71 Heading E1B A tie rod has an anchorage portion comprising a series of inner 7 and outer 1 cylindrical sleeves interconnected by annular spacers 6, through which reinforcing rods 10 between the sleeves passes, the walls of the sleeves being formed with weakenings so that when the anchorage is placed in a preformed hole and grout under pressure is introduced into the central space, the grout is forced out through the weakenings into the space between the sleeves and then into the ground. The central space is flushed out with water so that after the grout has cured a further injection may be made. Seals 14 are provided so that grout is only injected to one cylinder at a time. Alternatively the grouting tube 19 may carry a pair of seals. The spacers may comprise threaded sleeves 6". The sleeves are preferably made of asbestos **cement**. Various modifications of the spacers and sleeve interconnection are described. In a modified **method** the inner sleeves are omitted.

Classifications:

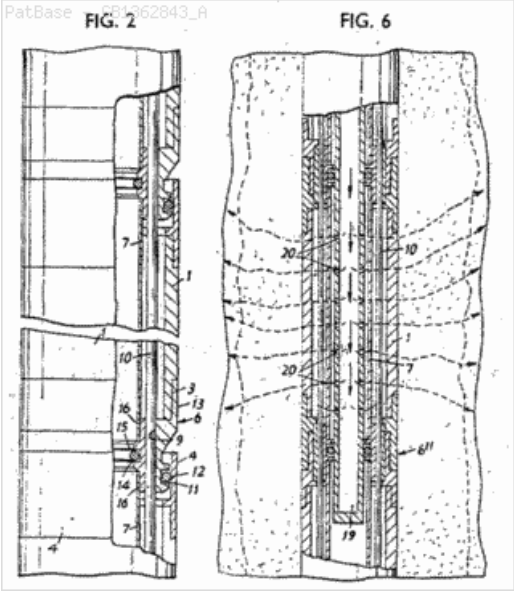
International (IPC 8-9): E02D5/80 (Advanced/Invention);

E02D5/80 (Core/Invention)

International (IPC 1-7): E02D5/80

CPC: E02D5/808

European: E02D5/80F



Family:

Publication number	Publication date	Application number	Application date
GB1362843 A	19740807	GB19710027775	19710614

Priority:

GB19710027775 19710614

Probable Assignee:

SMITH P A

Assignee(s): (std):

SMITH P A

Legal status (INPADOC)

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Patent	Date recorded	Event group	Code	Event	Details
GB1362843 A	19740807	LSGT	+	granted / extensions (spc, cpc, pte)	
GB1362843 A	19750403	LSRV	CSNS	APPLICATION OF WHICH COMPLETE SPECIFICATION HAVE BEEN ACCEPTED AND PUBLISHED, BUT PATENT IS NOT SEALED	
GB1362843 A	19910614	PEXP		Calculated Patent Term Expiry	

Title: **METHOD** FOR PRODUCING AN **ANCHORING TIE** ROD AND **ANCHORING TIE** ROD

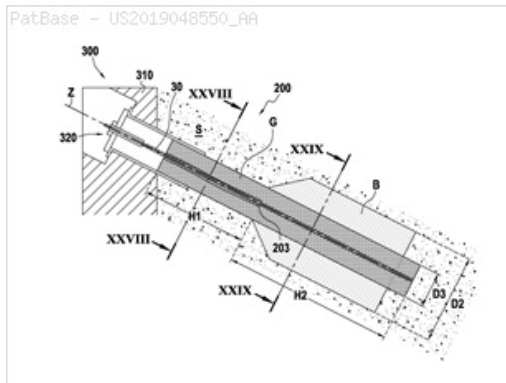
Abstract: The invention provides a **method** of constructing a ground anchor, wherein the **method** comprises performing an introduction step for introducing the boring tool into the ground along a boring axis (F) so as to form a top portion (C1), the mixer device being in the retracted position during the introduction step; then performing a mixing step during which the mixer device is taken to the deployed position and the boring tool is driven in rotation with the mixer device (14) in the deployed position while moving the boring tool axially along the boring axis and while injecting the fluid so as to perform mechanical in-situ mixing of the ground in place with the fluid, thereby forming a bulb (B) in the ground under the top portion (C1), which bulb has a second diameter (D2) that is greater than the first diameter (D1); inserting a reinforcement into the bulb, whereby a ground anchor is obtained.

Classifications:

International (IPC 8-9): E02D3/12 E02D5/44 E02D5/80

E21B7/00 (Advanced/Invention)

CPC: E02D5/808 E21B7/00 E02D3/12



Family:

Publication number	Publication date	Application number	Application date
AU2017218639 AA	20180816	AU20170218639	20170209
CO20180008388 A2	20180821	CO20180008388	20180809
EP3414399 A1	20181219	EP20170709135	20170209
FR3047496 A1	20170811	FR20160051052	20160210
SG11201806391U A1	20180830	SG20181106391	20170209
US2019048550 AA	20190214	US20170076701	20170209
WO17137702 A1	20170817	WO2017FR50297	20170209

Priority:

FR20160051052 20160210 WO2017FR50297 20170209

Probable Assignee: SOLETANCHE FREYSSINET

Assignee(s): (std): SOLETANCHE FREYSSINET

Inventor(s): (std): BOREL SERGE ; CUBILLOS IVAN ; GRUBER FELIPE ; LEBRETON MARIE ; URIBE JUAN FERNANDO

Inventor(s): MARIE LEBRETON ; SERGE BOREL ; IVAN CUBILLOS ; JUAN FERNANDO URIBE ; FELIPE GRUBER

Agent(s): COTTERS PATENT AND TRADE MARK ATTORNEYS; JOSE ANDRES RINCON USCATEGUI; CABINET BEAU DE LOMENIE; BALESTA PIERRE ET AL

Designated states: AE AG AL AM AO AT AU AZ BA BB BE BF BG BH BJ BN BR BW BY BZ CA CF CG CH CI CL CM CN CO CR CU CY CZ DE DJ DK DM DO DZ EC EE EG ES FI FR GA GB GD GE GH GM GN GQ GR GT GW HN HR HU ID IE IL IN IR IS IT JP KE KG KH KM KN KP KR KW KZ LA LC LI LK LR LS LT LU LV LY MA MC MD ME MG MK ML MN MR MT MW MX MY MZ NA NE NG NI NL NO NZ OM PA PE PG PH PL PT QA RO RS RU RW SA SC SD SE SG SI SK SL SM SN ST SV SY SZ TD TG TH TJ TM TN TR TT TZ UA UG US UZ VC VN ZA ZM ZW

Legal status (INPADOC)

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Patent	Date recorded	Event group	Code	Event	Details
AU2017218639 AA	20180816	LSPB	+	published / reissued	
CO20180008388 A2	20180821	LSPB	+	published / reissued	
EP3414399 A1	20181219	LSPB	+	published / reissued	
EP3414399 A1	20181219	LSSES	+17P	REQUEST FOR EXAMINATION FILED	EFFECTIVE DATE : 20180724
FR3047496 A1	20170811	LSPB	+	published / reissued	
FR3047496 A1	20170123	LSFE	+PLFP	FEE PAYMENT	YEAR OF FEE PAYMENT : 2
FR3047496 A1	20170811	LSSES	PLSC	SEARCH REPORT READY	EFFECTIVE DATE : 20170811
FR3047496 A1	20180123	LSFE	+PLFP	FEE PAYMENT	YEAR OF FEE PAYMENT : 3
SG11201806391U A1	20180830	LSPB	+	published / reissued	
US2019048550 AA	20190214	LSPB	+	published / reissued	
WO17137702 A1	20170817	LSPB	+	published / reissued	

WO17137702 A1	20180730	LSNP	+WWE	WIPO INFORMATION: ENTRY INTO NATIONAL PHASE	REF DOCUMENT NUMBER : 11201806391U COUNTRY OF REF DOCUMENT : SG
WO17137702 A1	20180808	LSNP	+WWE	WIPO INFORMATION: ENTRY INTO NATIONAL PHASE	REF DOCUMENT NUMBER : MX/A/2018/009642 COUNTRY OF REF DOCUMENT : MX
WO17137702 A1	20180811	LSNE	NENP	NON-ENTRY INTO THE NATIONAL PHASE IN:	REF COUNTRY CODE : DE
WO17137702 A1	20180816	LSNP	ENP	ENTRY INTO THE NATIONAL PHASE IN:	REF DOCUMENT NUMBER : 2017218639 COUNTRY OF REF DOCUMENT : AU DATE OF REF DOCUMENT : 20170209 KIND CODE OF REF DOCUMENT : A DESIGNATED STATE(S) :
WO17137702 A1	20180910	LSNP	+WWE	WIPO INFORMATION: ENTRY INTO NATIONAL PHASE	REF DOCUMENT NUMBER : 2017709135 COUNTRY OF REF DOCUMENT : EP
WO17137702 A1	20180914	LSNP	ENP	ENTRY INTO THE NATIONAL PHASE IN:	REF DOCUMENT NUMBER : 2017709135 COUNTRY OF REF DOCUMENT : EP EFFECTIVE DATE : 20180910

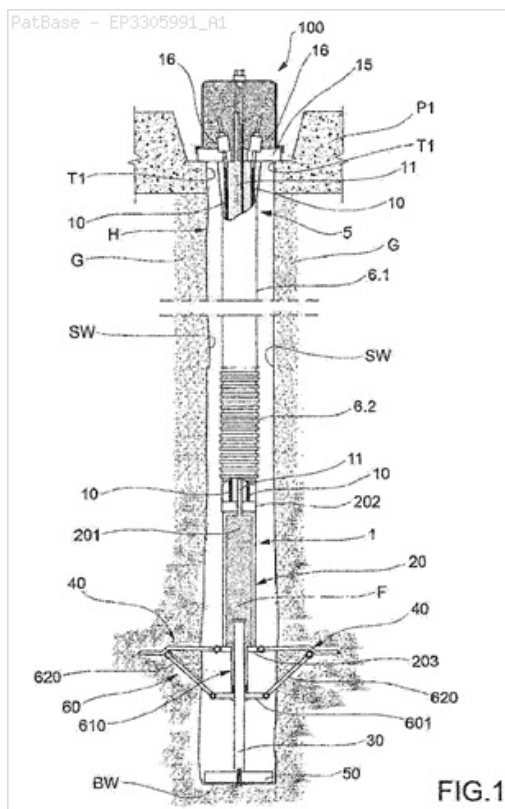
Title: ANCHOR DEVICE FOR **ANCHORING TIE** RODS AND PROCESS FOR ANCHORING SAID TIE RODS DISPOSITIF D'ANCRAGE POUR BARRES D'ANCRAGE ET PROCEDE D'ANCRAGE POUR CES BARRES D'ANCRAGE

Abstract: There is described an anchorage device (1; 1A; 1E) for anchorage tie rods suitable for being inserted into a perforating hole (H) made in a ground to allow anchoring an anchorage tie rod (5). The features of the anchorage device meet the need to increase the efficiency of transferring loads to the ground while almost completely eliminating the extraction problems of the tie rod. Indeed, the anchoring no longer occurs by relying on the friction resistance due to the mortar-ground adhesion, rather it is ensured by the mechanical resistance of penetrating and anchorage plates (40) which are first driven into the side wall (SW) of the perforating hole and then embedded with slurry. Therefore, with such a device, it will be more than sufficient to penetrate about 3 to 4 meters into the active stretch (thus drastically reducing the active length which generally may also reach 40 meters for conventional tie rods), open the penetrating and anchorage plates (40) by means of actuating a hydraulic cylinder, and once the penetration is complete, inject **cement** grout. Once anchored, the system can no longer be removed because the penetrating and anchorage plates (40), which are now spread and penetrated in the side wall (SW) of the hole (H), have an open diameter which is much greater than the diameter of the perforation, thus achieving, as mentioned, a mechanical type anchoring and no longer a friction anchoring. A process for anchoring anchorage tie rods is also described.

Classifications:

International (IPC 8-9): E02D5/80 E04C5/12 (Advanced/Invention)

CPC: E02D5/80



Family:

Publication number	Publication date	Application number	Application date
EP3305991 A1	20180411	EP20170194799	20171004
IT201600100902 A1	20180407	IT201610000100902	20161007

Priority:

IT201610000100902 20161007

Probable Assignee: PROMETEC S R L

Assignee(s): (std): PROMETEC S R L

Assignee(s): PROMETEC SRL

Inventor(s): (std): FICHERA ALFREDO

Agent(s): CARANGELO PIERLUIGI

Designated states: AL AT BA BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC ME MK MT NL NO PL PT RO RS SE SI SK SM TR

Legal status (INPADOC)

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Patent	Date recorded	Event group	Code	Event	Details
EP3305991 A1	20180411	LSPB	+	published / reissued	
EP3305991 A1	20181219	LSES	+17P	REQUEST FOR EXAMINATION FILED	EFFECTIVE DATE : 20181009
IT201600100902 A1	20180407	LSPB	+	published / reissued	

Title: TIE ROD ANCHORING **METHOD** AND APPARATUS

Abstract: 1,129,113. Percussive drills. SANDVIKENS JERNVERKS A.B., and ATLAS COPCO A.B. 10 Nov., 1965 [11 Nov., 1964], No. 47783/65. Heading B4C. [Also in Division E1] A tie-rod 20 to be anchored in the ground comprises a first imperforate single-walled open-ended tubular member 21, having at the leading end a head 23 with at least one passageway 73 therethrough connecting with the interior of the members 21, which is drawn into the ground by a percussive drilling machine, and one or more additional members 21 which are successively joined to the first member to increase the total length of the rod. The head 23 has wear resistant cutting edges 70 which are brazed to it, and openings 73, which may be directed forwardly or laterally, for flushing medium or grout. The members 21 are connected together by internally threaded sleeves (22), Fig. 4 not shown, or they may be male and female threaded. The members 21 may be circular or polygonal in cross-section, and may be made from carbon steel, low alloy steel with manganese, or a corrosion resistant material. Flushing medium is supplied to a shank adapter (33), Fig. 5 not shown, by a head (75), Fig. 8, not shown.

Classifications:

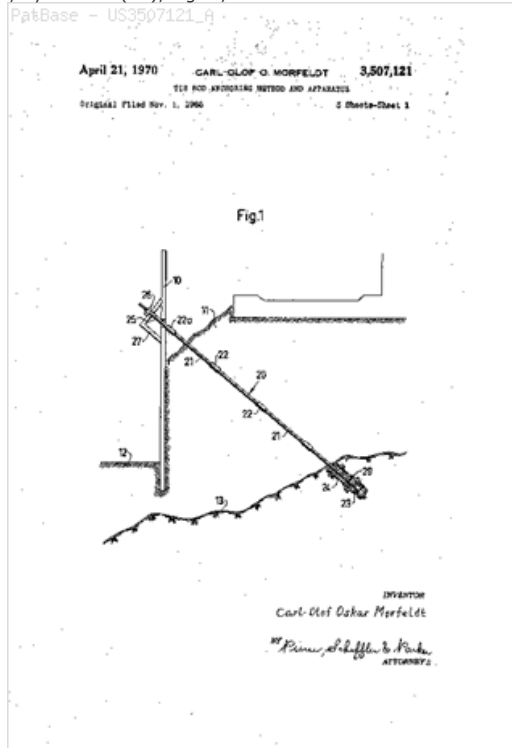
International (IPC 8-9): E02D5/76 E04H12/20 (Advanced/Invention); E02D5/74 E04H12/00 (Core/Invention)

International (IPC 1-7): E01D19/02 E02D5/74 E02D5/76

CPC: E02D5/76 E04H12/20

European: E02D5/76 E04H12/20

US: 405/259.5 52/155 52/741.11 52/742.15



Family:

Publication number	Publication date	Application number	Application date
AT275419 B	19691027	AT19650010127	19651110
BE672171 A	19660301		19651110
CH459074 A	19680630	CH19650015533	19651110
DE1297044 B	19690604	DE1965S100347	19651103
FI443359 B	19710630	FI19650002668	19651108
GB1129113 A	19681002	GB19650047783	19651110
NL139791 B	19730917	NL19650014655	19651111
NL6514655 A	19660512	NL19650014655	19651111
NO121388 B	19710215	NO19650160382	19651108
SE318830 B	19691215	SE19640013549	19641111
US3507121 A	19700421	US19680731685	19680520

Priority:

SE19640013549 19641111

Probable Assignee: SANDVIKENS JERNVERKS AB

Assignee(s): (std): ATLAS COPCO AKTIENBOLAG ; CARL OLOF OSKAR MORFELDT ; SANDVIKENS JERNVERKS AB ; ATLAS COPCO AB ; SANDVIKENS JERNVERKS AKTIENBOL

Assignee(s): SANDVIKENS JERNVERKS AKTIEBOLAG SANDVIKEN EN ATLAS COPCO AKTIEBOLAG NACKA ZWEDEN ; ATLAS COPCO AKTIEBOLAG ; SANDVIKENS JERNVERKS AKTIEBOLAG ; SANTRADE LTD ; SANDVIKENS JERNVERKS AKTIENBOLAG

Inventor(s): (std): MORFELDT C ; MORFELDT CARL OLOF OSKAR ; MORFELT C ; OLOF OSKAR MORFELDT CARL ; OSKAR MORFELDT CARL OLOF

Inventor(s): CARL OLOF OSKAR MORFELDT

Legal status (INPADOC)

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Patent	Date recorded	Event group	Code	Event	Details
AT275419 B	19691027	LSGT	+	granted / extensions (spc, cpc, pte)	
AT275419 B	19851110	PEXP		Calculated Patent Term Expiry	

BE672171 A	19660301	LSPB	+	published / reissued	
BE672171 A	19851110	PEXP		Calculated Patent Term Expiry	
CH459074 A	19680630	LSGT	+	granted / extensions (spc, cpc, pte)	
CH459074 A	19851110	PEXP		Calculated Patent Term Expiry	
DE1297044 B	19690604	LSPB	+	published / reissued	
FI44359 B	19710630	LSGT	+	granted / extensions (spc, cpc, pte)	
GB1129113 A	19681002	LSGT	+	granted / extensions (spc, cpc, pte)	
GB1129113 A	19851110	PEXP		Calculated Patent Term Expiry	
NL139791 B	19730917	LSPB	+	published / reissued	
NL139791 B	19810916	LSLE	-VJC	LAPSED DUE TO NON-PAYMENT OF THE DUE MAINTENANCE FEE FOR THE PATENT OR PATENT APPLICATION	
NL139791 B	19851111	PEXP		Calculated Patent Term Expiry	
NL6514655 A	19660512	LSPB	+	published / reissued	
NO121388 B	19710215	LSPB	+	published / reissued	
SE318830 B	19691215	LSPB	+	published / reissued	
US3507121 A	19700421	LSGT	+	granted / extensions (spc, cpc, pte)	
US3507121 A	19820914	LSAS	AS	ASSIGNMENT	OWNER NAME : SANTRADE LTD., ALPENQUAI 12, CH-6002, LUCERNE, SWI DESCRIPTION : ASSIGNMENT OF ASSIGNORS INTEREST.; ASSIGNOR:SANDVIK AKTIEBOLAG, A CORP. OF SWEDEN; REEL/FRAME:004085/0132 EFFECTIVE DATE : 19820908

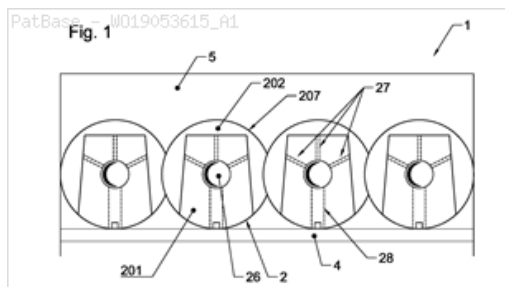
Title: RETAINING WALL COMPRISING PRECAST PILES AND PILE FOR SUCH A WALL

Abstract: The invention relates to a concrete precast unitary draining pile (2) and a draining retaining wall (1) comprising a plurality of these piles. The pile, of at least 4 metres in length and of a maximum diameter between 40 and 150 cm, is provided with a longitudinal opening (26) intended for draining water vertically through the pile. The retaining wall comprises a plurality of these piles, each pile comprising a first portion driven into a hole (50) in the ground (5) and a second portion extending vertically above the ground. The wall may comprise panels (3) between the piles intended for holding back the ground (6). The **method** of assembling a retaining wall comprises a step of drilling at least two boreholes, inserting a pile in each hole and casting or spraying concrete between said piles.

Classifications:

International (IPC 8-9): E02D17/20 E02D31/02 E02D5/10 E02D5/30 E02D5/48 E02D7/00 (Advanced/Invention)

CPC: E02D5/56 E02D5/10 E02D5/30 E02D5/48 E02D5/72 E02D7/22 E02D17/04 E02D31/02 E02D7/00



Family:

Publication number	Publication date	Application number	Application date
CH714141 A1	20190315	CH20170001135	20170913
WO19053615 A1	20190321	WO20181B56978	20180912

Priority:

CH20170001135 20170913

Probable Assignee: CREABETON MATERIAUX SA

Assignee(s): (std): CREABETON MATERIAUX SA

Inventor(s): (std): ADRIAN FORRER ; AGNES PETIT ; BLAISE FLEURY ; ERDJAN OPAN ; FLEURY BLAISE ; FORRER ADRIAN ; FREDERIC MAYORAZ ; MAYORAZ FREDERIC ; OPAN ERDJAN ; PETIT AGNES

Agent(s): P AND TS AG LTD SA

Designated states: AE AG AL AM AO AT AU AZ BA BB BE BF BG BH BJ BN BR BW BY BZ CA CF CG CH CI CL CM CN CO CR CU CY CZ DE DJ DK DM DO DZ EC EE EG ES FI FR GA GB GD GE GH GM GN GQ GR GT GW HN HR HU ID IE IL IN IR IS IT JO JP KE KG KH KM KN KP KR KW KZ LA LC LK LR LS LT LU LV LY MA MC MD ME MG MK ML MN MR MT MW MX MY MZ NA NE NG NI NL NO NZ OM PA PE PG PH PL PT QA RO RS RU RW SA SC SD SE SG SI SK SL SM SN ST SV SY SZ TD TG TH TJ TM TN TR TT TZ UA UG US UZ VC VN ZA ZM ZW

Legal status (INPADOC)

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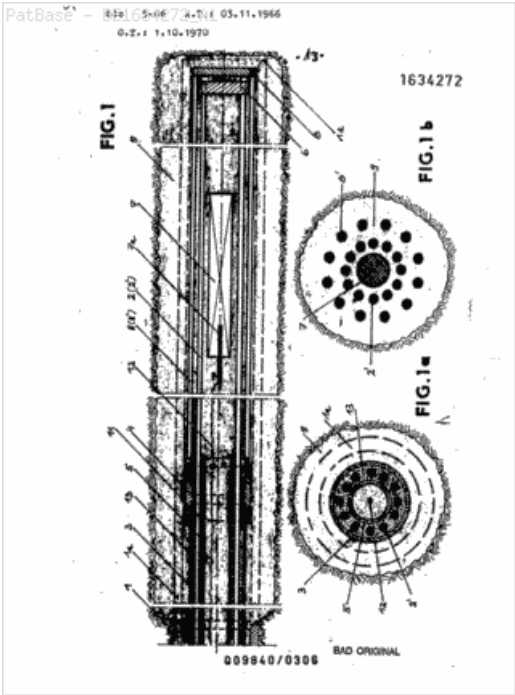
Patent	Date recorded	Event group	Code	Event	Details
CH714141 A1	20190315	LSPB	+	published / reissued	
WO19053615 A1	20190321	LSPB	+	published / reissued	

Title: VORRICHTUNG ZUM UNTERIRDISCHEN HERSTELLEN EINES ERWEITERTEN ANKERFUSSES FUER ZUGANKER ZUR VERANKERUNG VON BAUTEILEN IM BODEN DEVICE FOR PRODUCING A SUBTERRANEAN EXTENDED ANCHOR FOOT FOR TIE RODS FOR ANCHORAGE OF COMPONENTS IN THE SOIL (Machine translation)

Abstract: Source: DE1634272A1 [DE] (Claim 1) 1. Vorrichtung zum unsertdi:cilen Herjieilen eines erreiterten Ankerfunes bei Zug- oder __a. l_ U ilue `J_#.#@:ill#.#li@j 1,# __ einen..u., JJ# -!ai # __ #elUe eines Vor _ tre lL ahre2 her;ez-uelsten hEahiloch, dadurch ge liennueeicuenel, das2 die Vorrichtung ccurcheinen aus inn Zug- bzw. i:_ersehnen (2') des herzus bellenden Pfahles beorMenden, die ha=engl;;uenn; ('l) enthaltenden 3ewehrung2korb (2) gebildet io i;; der als Ganzes ait der iprenglerung in uN Wahiloch bis zu dessen un-t@.:re: Ei:@@e einJrin;bar M und an seinem unteren Inde durch eine der 3arengung widern tuhondE, die tueikerstAh! e (21) 1'ussplalt e (s) abgeschlossen isst.

Machine translation: (Claim 1) 1. Device to unsertdi: cilen Herjieilen of a erreiterten Ankerfunes with course or __a. l_ U ilue `J_#.#@:ill#.#li@j 1, # __ one..u., JJ# -! ai # __ #elUe of a before _ tre lL ahre2 ago; hEahiloch, thus ge ez-uelsten liennueeicuenel, das2 the device ccurcheinen out inn course and/or. i: _ersehnen (2 ') herzus the barking stake beorMenden, ha=engl;; uenn; ('l) containing 3ewehrung2korb (2) in an educated manner IO i;; that as a whole ait iprenglerung in uN Wahiloch up to its un-t@.: RH: Egg: @@e einJrin; without M and at its lower Inde by one the 3arengung widern tuhondE, tueikerstAh! e (21) 1 ' ussplalt e (s) locked eats.

Classifications:
International (IPC 8-9): E02D5/80 (Advanced/Invention); E02D5/80 (Core/Invention)
International (IPC 1-7): E02D5/80
CPC: E02D5/808
European: E02D5/80F



Family:

Publication number	Publication date	Application number	Application date
DE1634272 A1	19701001	DE19661634272	19661003

Priority:

DE1966B089187 19661003

Probable Assignee: BAUUNTERNEHMUNG MAST GMBH

Assignee(s): (std): BAUUNTERNEHMUNG MAST GMBH

Inventor(s): (std): KAISER HORST ; SCHINDLER KURT ; STEINS LOTHAR ; WALTER PAUL

Legal status (INPADOC)

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Patent	Date recorded	Event group	Code	Event	Details
DE1634272 A1	19701001	LSPB	+	published / reissued	

Title: PROCEDIMIENTO DE ANELAJE DE TIRANTE EN UN TERRENO SUELTO.

Abstract: Source: FR2201373A [FR] [Source: Claim 1] 1.- Procède d'ancrage de tirant dans un terrain meuble, par injection d'un coulis à base de ciment autour de ce tirant, caractérise en ce que l'on garnit d'abord l'espace qui entoure le tirant, sur la portion à sceller, d'une masse d'un produit susceptible de faire prise puis pendant que cette masse fait prise, on injecte en son sein le coulis de scellement à une pression suffisante pour faire éclater ladite masse en morceaux qui se trouvent alors enfoncés dans le terrain à la manière de coins, pour assurer l'ancrage du tirant. **Machine translation:** [Source: Claim 1] 1. **Method** of anchoring pulling in soft ground by injecting a grout **cement** around this drawing, characterized in that said one of the first garnish space qui surrounds the pulling on the seal portion has, with a mass of a product capable of doing then taken as this mass is made, is injected therein sealing grout has sufficient pressure to cause bursting of the said mass into pieces which are then downhill in the field to the manner of corners, for anchoring the tie.

Classifications:

International (IPC 8-9): E02D5/74 (Advanced/Invention);
E02D5/74 (Core/Invention)

International (IPC 1-7): C04B13/00 E02D5/00 E02D5/74

CPC: E02D5/74

European: E02D5/74

Family:

Publication number	Publication date	Application number	Application date
CH572557 A	19760213	CH19730011473	19730808
ES419115 A1	19760416	ES19730419115	19730927
FR2201373 A1	19740426	FR19720034378	19720928
FR2201373 B1	19790914	FR19720034378	19720928
IT1014508 A	19770430	IT19730027777	19730810

Priority:

FR19720034378 19720928

Probable Assignee: SOLETANCHE

Assignee(s): (std): SOLETANCHE

Assignee(s): SOLETANCHE SA ; SOLETANCHE SA FR

Legal status (INPADOC)

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Patent	Date recorded	Event group	Code	Event	Details
CH572557 A	19760213	LSGT	+	granted / extensions (spc, cpc, pte)	
CH572557 A	19810430	LSLE	-PL	PATENT CEASED	
CH572557 A	19930808	PEXP		Calculated Patent Term Expiry	
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